Organic Products : Marketing Practices And Problems In The Plains And Hilly Regions Of Uttarakhand

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ABSTRACT

In the present study, the investigator explored the problems perceived in marketing of organic products by farmers in Uttarakhand state of India. Descriptive research design with survey method, wherein data were collected through face-to-face structured interviews with 72 farmers in the plains and hilly regions of Uttarakhand was adopted for the present investigation. Data were analyzed with descriptive statistics and Chi square test to provide additional information about the effect of the selected variables on perceived problems. The objectives focused on the prevalent marketing practices adopted by the farmers for organic crops and to ascertain marketing related problems perceived by them with reference to organic crops. The most prominent problem in marketing of organic crops reported by the respondents in the plain areas of the state of Uttarakhand was related to 'High Production Cost' that led to low profit, or no profit ; while the largest proportion of the respondents from the hills reported 'Unavailability of an earmarked market place/shop for organic crops' to be their biggest cause for concern. The paper further deals with the market place for transaction, distribution channels, satisfaction of the sample of farmers, information on organic crops grown, perceived problems of farmers and implications of the study.

Keywords : Organic Farming, Marketing Practices, Marketing Problems, Distribution Channels, Retailers

INTRODUCTION

Organic agriculture is a production system that sustains the health of soils, ecosystems and people. It relies on ecological processes, bio - diversity and cycles adapted to local conditions, rather than the use of inputs with adverse effects. Organic agriculture combines tradition, innovation and science to benefit the shared environment and promote fair relationships and a good quality of life for all involved (IFOAM).

Among the most stringent definitions is that of US Department of Agriculture, which defined Organic Farming as, "A system that is designed and mailed to produce agricultural products by the use of methods and substances that maintain the integrity of organic agricultural products until they reach the consumer." According to Funtilana (1990), "Organic Farming is giving back to the nature what is taken from it."

Organic agriculture offers multiple benefits to developing countries like India. These include ecological (e.g. improved soil fertility and water quality, prevention of soil erosion, preservation of natural and agro biodiversity) and social effects (e.g. generation of rural employment and corresponding lower urban migration, improved household nutrition and local food security and reduced dependence on external inputs) apart from the premium price it can fetch in the global market and its ensuing impact on foreign exchange position of the Indian economy through exporting organic products. Organic farming is economically viable, as farmers do not have to spend a lot of money, because of the natural cycles that maintain nature in order.

Over recent years, many organic farmers have emerged in different parts of India. However, they have not been able to create an impact due to their inability to create proper networks for inspection and certification of organic crops. The producers are ready with their products for consumers, but the intermediary validation channels are yet formed. Intermediary validation channels are the channels or agencies for inspection and certification of organic crops. In the agriculture sector, it is very important that the cycle of production is short and sufficient. The agricultural sector differs from other sectors in that the raw materials, intermediate products and products often have a short storage life, most agricultural products are seasonal; they have a fast circulation rate; the products have a large volume; there are many producers, less retailers; and social organizations and consumers are concerned about product and process quality.

To boost organic agriculture in India, adequate marketing is necessary. There is a need of more efficient marketing strategies for organic agriculture sectors. The gap in marketing organic products from organic producers to consumers has to be bridged by policymakers, scientists, NGOs and such other intelligentsia and organizations. Policy change in favor of organic agriculture can make a positive difference for changing the market condition in terms of encouraging

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production of bio-inputs, which in turn can propel changes in cropping pattern in favor of organic practices. Currently, the attention given to both in terms of policy framework and institutional dynamics towards organic agriculture is only marginal. Scientists can help to produce low cost bio-inputs to maintain the quality of organic products.

The market of organic products is still in its nascent stage in India; however, it is growing rapidly. In developed countries, the organic products have a well-established market. Organic marketing in India needs to be developed and consequently strengthened.

SCOPE OF THE STUDY

The future of organic farming looks very bright - thought-out organic marketing appears to be quite challenging. Well thought - out marketing strategy that includes organization and guidance for small farmers in specific, financial assistance, buy back assurance and certain premium for products needs to be drawn to promote and sustain organic farming effectively. India needs to strengthen the organic marketing network and reduce certification costs for farmers of organic products in order to make a dent in the global market.

Uttarakhand is a Himalayan state in North India consisting of 13 districts, of which 10 fall under the hilly and mountainous zone. Agriculture in the hilly regions of Uttarakhand is *by default 'organic'*, as the small and scattered land holdings of farmers do not encourage them to adopt costlier agronomical practices (Kadiyal and Dimri, 2009). In addition, they do not have proper facilities of transportation to collect fertilizers and pesticides from the markets situated far from their residing/farming place. However, in the plain regions of Uttarakhand, farmers are adopting agronomical practices followed in conventional farming. Uttarakhand is leading to be the first totally organic state in India (Mishra , 2006). Farmers are switching over to organic farming. However, efficient marketing strategies are needed to give a boost to organic farming.

The present investigation illustrates a comparative analysis of the marketing practices of farmers of plains and hilly regions of Uttarakhand. In view of an assumption that in the hilly regions, organic farming is more popular, and the farmers follow the guidelines of NPOP (National Program on Organic Production) to a great extent, this investigation was planned to be carried out in both - the plains and the hilly regions of Uttarakhand. The investigator found information related to the problems perceived in marketing of organic products by farmers in Uttarakhand . Certain questions like - What are the distribution channels of marketing of organic products in the plains and hilly regions of Uttarakhand? Are there any differences in the market place of organic produce in the plains and hilly regions of Uttarakhand? Are the farmers satisfied with the marketing strategy of organic products? The investigator conducted the present research to seek out the answers to the aforementioned questions.

OBJECTIVES OF THE STUDY

1) To identify the present marketing practices adopted by the farmers for organic crops in plain and hilly regions of Uttarakhand with reference to distribution channels, place of marketing and their satisfaction with the price offered for their produce.

2) To ascertain marketing related problems perceived by the farmers with reference to organic crops in plains and hilly regions of Uttarakhand.

3) To elucidate the association between problems in marketing of organic products perceived by the farmers and location of their farmland.

REVIEW OF LITERATURE

The review presents an elaborate account of studies related directly or indirectly to the present study. Several studies show that the trend of organic products is increasing regularly, such as USDA statistics report that sales of organic products in the US have grown 20 % or more each year for the past decade. Fresh produce constitutes the largest sector of the organic industry and accounts for a significant share of the organic market growth. According to an ITC market review, while their market share on an average is no more than 2% in most developed countries, the rate of growth is close to 25-30% for such products in most countries.

Estimates of how many consumers used organic food (at least some of the time) varied from 55% (Whole Foods Market) to 63% (Walnut Acres) to 66% (Food Marketing Institute). About a third of US consumers bought organic

products in the past six months, and 85% of the consumers planned to either increase or maintain their level of organic purchasing in the next six months. On the other hand, just 3% of the people who had not bought organic items planned to start doing so. Further, it was observed that around 40% of the adults used organic products regularly. Market for organic produce is growing incessantly, albeit at a lower rate . Still, there is an urge to make policies and strategies for marketing of organic produce (Organic Consumers Association, 2003).

From only a few countries, some data on the local markets was available. In India, the total organic production was about 14,000 tonnes, but domestic sales accounted for only 1050 tonnes (7.5%). However, the domestic market is still growing, and a number of recently launched marketing initiatives increased the sales to around 1500 tonnes (IFOAM, 2003). Bhattacharyya and Chakraborty (2005) suggested that the basic focus of organic farming should first be to produce farm products for the home (domestic) market and secondarily, for the export market. They further stated that during 2004-05, the total organic export was 6472 metric tonnes, with approximate value of ₹ 80-90 crore, where the maximum products came from Kerala (1232 metric tonnes). Although an organic marketing initiative is generally supposed to focus on sales, ensuring constant supply is just as important. For an organic marketing sector to develop and grow, initiatives and the sector as a whole have to consider securing a full array of services for production support as well as for the full chain of custody, from farm to table (Wai, 2000).

In China, food-safety issues have become a growing concern in the last few years, resulting in the growth of the domestic organic food market. Together with a continuing economic growth, demand for organic products is likely to continue to increase, possibly rising to 2% of the entire food sales in China (Yussefi & Willer, 2003).

Cook (1988) reported that 78% of California's organic farmers utilized specific organic market outlets that were wholesale or brokers, with direct selling to consumers and retailers. According to Borgstein and Zimmerman (1993), specialty shops and supermarkets play only a very modest role in marketing of organic products in Netherlands. Conner and Martinez (2008) concluded by posing a few market strategies to increase marketing and consumption of organic products such as to increase the prevalence of consumer direct, direct-to-retail and direct-to-institution sales by small and medium-sized farmers, and transition to organic produce by large-scale farmers already accustomed and equipped with production and cooling capacity, insurance, food-safety certification and the like, and selling to wholesale markets.

Chandra and Shankar (2007) stated that the bigger challenge before organic food was marketing - though the demand for organic products was increasing - there were many major obstacles to further the development of the organic market, which needed to be removed.

Jha (2002) recognized that to increase the marketing of organic products, the challenge is to mainstream production and trading opportunities to ensure that a large number of producers in developing countries can take advantage of such markets, and to ensure that production and export can be maintained and expanded in the long run.

Jarvell et al. (2004) said that lack of differentiation from conventional foods might discourage consumers. Extra costs did limit the interest of processors and retailers. The political decisions and subsidies were directed at production and had few direct effects on the organization of the value chain.

Kaldis et al. (1996) conducted a study in Greece and stated that the absence of a systematic and well organized market, and the corresponding poor marketing functions are negative determinant factors in the expansion of organic farming. It was suggested to provide trade services to foster the organic farming market.

According to Murayama (1997), price marketing decisions and close relationships between producers and consumers, appropriate size of circulation and trust based relationships are important for enhancing the present status of organic product marketing. He further stated that an increase in the consumption of organic products was also necessary, which became a driving force for enhancing domestic organic agriculture in Japan. Hamm and Michelsen (2000) analyzed the organic food market in Europe. The results of the analysis of the European markets for organic food showed that markets in general were very small, but with extraordinary high growth rates. Research on organic market exploration was conducted in the United States by Lohr and Graf (2000). The study showed that high valued markets tended to be clustered in or near cities, while farmers' markets were more evenly distributed. It further stated that direct to consumers' outlets were the best entry points for new organic farmers. A study was conducted by Eisenbach (2002) to find out the distribution channels for Greek organic food in the domestic and international market. The study suggested that the organic food industry in Greece lagged behind other European countries - both in terms of production and consumption. However, an increasing trend is the active involvement of people in environmental issues and organic farming was evident in the country. Baraskina (2002) suggested that in order to satisfy the needs of consumers and

income of producers, optional marketing strategy must be elaborated and coordinated by officials as well as supported by organic farmers. A study was conducted by Joginder (2009) on impact assessment of centre of organic farming in Uttarakhand, and he concluded that high fluctuation in markets of organic products stemmed from export orders, and overall supply and demand situation ; involvement and intentions of the market contracting agencies were specific fears lurking in the minds of the farmers which needed to be addressed properly.

Roshan (2010) stated that the problems encountered in the marketing of organic produce have also hindered its growth in the country. It is very important that organic produce is marketed at a premium price over conventional produce, so that it becomes viable for farmers to adopt these methods regularly on a large scale. There is huge international demand for organic produce, but so far, the output in India has been insufficient to meet this demand.

The review of related literature has revealed that there is a dearth of Indian studies on marketing of organic products and problems faced by the farmers engaged in organic farming. This substantiated the need for the present investigation.

RESEARCH METHODOLOGY

A descriptive research design was formulated to achieve the objectives laid out for the present study. A descriptive research design using survey methods was chosen to find out the prevalent marketing practices taken up by the farmers for the marketing of organic crops, and the study also intended to shed light on the problems faced by the farmers.

❖ **Sampling Design and Sample Size :** The present study was conducted in the plains and hilly regions of Uttarakhand. In view of the assumption that in the hilly regions, organic farming was more popular, two districts (Nainital and Dehradun) were selected from the hilly regions, and one district (U. S. Nagar) was selected from the plain regions through purposive random sampling. From each district, two blocks were purposively selected and further, from each block, two villages were selected. The blocks selected were such that they contained the villages earmarked as bio - villages. For the selection of the villages, purposive random sampling was used as the villages were chosen from the list of bio - villages of the selected districts obtained from UTDASP (Uttaranchal Diversified Agriculture Support Project) and National Organic Commodities Board.

❖ **Delimitations :** 72 farm families who produced and marketed organic products.

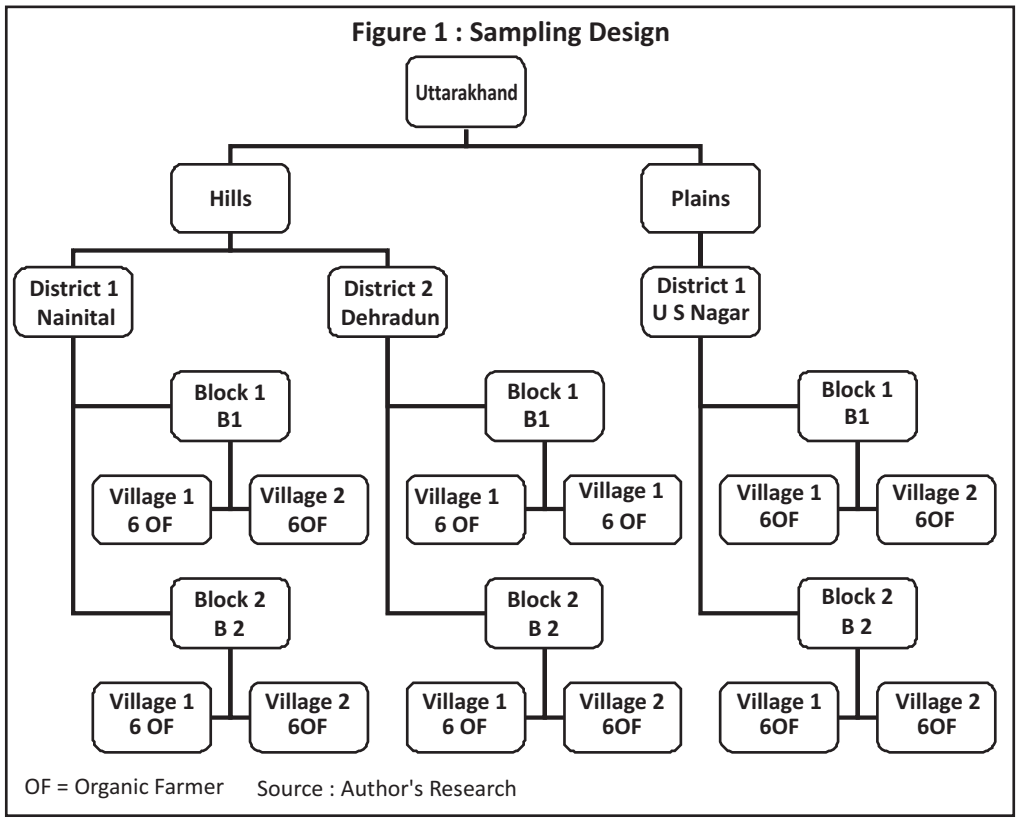
❖ 2 villages each from two blocks of 2 districts in the hilly regions and 2 villages each from two blocks of one district of the plains in the state of Uttarakhand. The district was further divided into different blocks and the blocks were divided into villages.

❖ **Hypothesis : There is a difference in the problems perceived by organic producers in the plains and hilly regions.**

Selected Locales For The Present Investigation

S. No.	Regions	Districts	Blocks	Villages
1	Plain	U. S. Nagar	Rudrapur	Keeratpur
				Sutaiya
			Gadarpur	Alakhdevi
				Shyamnagar
2	Hills	Nainital	Bhimtal	Songaun - talla
				Songaun- malla
			Haldwani	Haripur purnanand
				Lamachaur
		Dehradun	Raipur	Kedarpur
				Banjarawala
			Doiwala	Nakronda
				Brahmanwala

Source : Author's Research



For the selection of the farm families, random sampling procedure was followed. A sampling frame was developed through a census survey in the villages. A detailed list of farmers growing and selling organic crops was prepared from four selected villages of the plains and eight selected villages from the hills through a census survey. This sampling frame contained 32 farmers from the plains and 65 farmers from the hilly regions. This means that a total of 32 farmers were organic farmers in the selected villages of the plains, and 65 farmers were organic farmers from the selected villages of the hilly regions. The farmers who had been growing organic crops on their farm land since more than one year were called as organic farmers for the purpose of the present study. Thereafter, six organic farmers from each village were selected randomly. Hence, twenty four organic farmers were selected from the villages of the plains i.e. Udham Singh Nagar district. Forty eight farmers were selected from the villages of hilly regions of Uttarakhand, 24 organic farmers each from Nainital district and Dehradun district. Total sample size comprised of 72 farmers (Figure 1).

❖ **Development of The Instrument and Data Collection Procedure :** Two tools namely, Census survey schedule and Organic Farmers' Survey Schedule were used for the present study.

❖ **Census Survey Schedule :** To prepare a sampling frame, a census survey of organic farmers in the selected villages was carried out. A pre-coded interview schedule was used to elicit data on organic farming and farmers' history of organic farming. This survey was conducted on all organic farmers of the selected villages.

❖ **Organic Farmers' Survey Schedule :** This interview schedule was prepared to elicit data on marketing practices, crops used for home consumption and for sale, and related information. Descriptive data were collected from 72 samples in person by using a pre - coded interview schedule. Information was noted down on the interview schedule. The investigator explained the purpose of the investigation to the sample farmers and fixed an appointment for conducting an interview. A pilot study was accomplished with 24 farmers to check the appropriateness of the interview schedule. Minor changes were made in the tool on the basis of the pilot study, and then the same was finalized to collect the final data.

RESULTS AND DISCUSSION

The marketing of organic products has paramount significance for organic farmers. This is even truer for the small-scale organic farmers, whose impact on the market and whose profit margins are both likely to be small too. The investigator tried to find out the marketing practices used by the farmers for marketing their organic crops. The findings related to marketing and related aspects like distribution channels, satisfaction of the farmers with price, information on organic crops raised, marketing problems perceived by the farmers are presented in the Tables 1 to 5.

❖ **Markets Where The Produce Was Sold :** In this section, the investigator tried to identify the place where the farmers sold their organic products. The analysis of the data showed that all the farmers in the plains and hilly regions sold some of their organic products in the local market in addition to other places. In addition to this, some farmers, i.e., 33 per cent and 19 per cent sold their products at the *mandi* (it is the place for marketing of vegetables and grains exclusively where retailers, middlemen, wholesalers and *Arati* (money lenders are present)) in the hilly regions respectively (Table 1). Nearly 17 per cent of the respondents who belonged to the hilly regions indulged in direct selling of their products from the stock at home. About 12 per cent sold to cooperative societies and thereby, to consumers through them. The data shows that there was no separate market area for selling of organic products, nor did they have any proper marketing network. Most of the farmers sold their produce through the village level markets, fairs, *mandis* and cooperative societies.

Table 1 : Distribution of The Farmers By Markets Where They Sold The Produce

Produce Sold In	Plain (N=24)		Hills (N=48)		Total (N=72)	
	N	%	N	%	N	%
Local Market	24	100	48	100	72	100
Mandi	8	33.4	9	18.72	17	23.6
Others (Cooperative Society)	-	-	6	12.48	6	8.32
Direct selling from home	-	-	8	16.64	8	11.10
Source : Primary Data						

❖ **Distribution Channels For Marketing of Organic Products :** The investigator tried to find out the distribution channels catered to by the selected farmers to market their products. The investigator tried to find out the chain of intermediaries for marketing of organic products between organic producers to the end consumer. More than one system of marketing was reported by the sample farmers under the study (Table 2) as they sold their products through different distribution channels. The most commonly followed system of marketing of the organic produce was direct selling to the consumers (38.86%). Direct selling to the consumers implies selling to only those consumers who were contracted by the farmers at the time of planting the crop. In this arrangement, the consumers do not provide any inputs. However, the farmers benefitted as they had an assured market for their produce and were protected against price fluctuations. Nearly 33 per cent of the respondent farmers in both the regions sold to government agencies and to the *'Arati'* (money lenders) respectively (Table2).

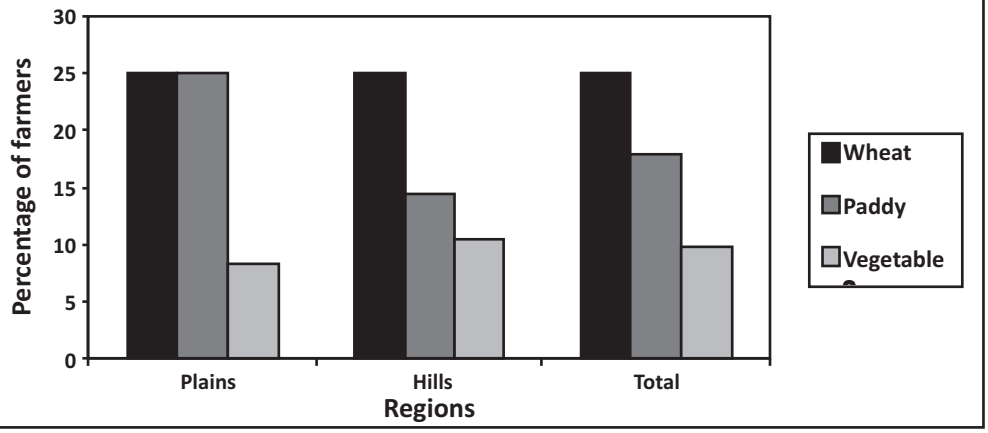
Table 2 : Distribution of Farmers By The Distribution Channels For Marketing Of Organic Products

Distributional channels	Plain (N=24)		Hills (N=48)		Total (N=72)	
	N	%	N	%	N	%
Directly to consumers	6	25	22	45.7	28	38.86
Retail shops	6	25	8	16.64	14	19.43
Private middlemen	-	-	2	4.16	2	2.788
Wholesaler	4	16.68	12	25	16	22.08
Government agency (UTDASP)	8	33.36	16	33.28	24	33.31
Money lender	-	-	24	50	24	33.31
Source : Primary Data						

The retailers as a distribution channel were used slightly more in the plains than in the hills, while wholesalers were used slightly more in the hilly regions as compared to the plains. A small percentage of the respondent farmers in the hills, i.e., nearly four per cent sold their produce to the private middlemen. Half of the respondents in the hills sold their produce to other distribution channels such as the money lenders. The farmers who borrowed money from moneylenders entered into a contract with them to sell their crops to them on harvest. Money lenders sold the farmers' crops into the market. Nearly one third of the total sample farmers either sold their crops to a Government agency - UTDASP (that is promoting organic farming in the state. Farmers were growing organic crops under their project and sold their products to the same organization.) or to the money lenders, and about one fifth each sold to retailers and wholesalers (Table 2). Direct sale to consumers was more common in the selected areas of the present study. Organic farmers stored their produce at home, and they sold it directly to the consumers (from the stored produce).

❖ **Distribution of The Farmers By Products Sold Directly To The Consumers :** The findings related to direct selling of organic produce to consumers revealed that nearly one-fourth of the respondent farmers in the plain regions and 46 percent of the respondents in the hilly regions sold their products directly to the consumers (Table 2). The produce directly sold by them to the consumers were wheat, paddy and vegetables. Nearly one-fourth of the respondents sold wheat and paddy directly to the consumers in the plains, whereas a similar observation was true in the case of wheat only in the hilly regions under study (Graph 1). The Total bar in Graph 1 depicts the collective percentage of the farmers from the plains and hilly regions selling their crops directly to the consumers.

Graph 1 : Distribution Of The Farmers By Products Sold Directly To The Consumers



Source : Author's Research

Farmers were selling their products directly to the consumers whom they contracted earlier at the time of planting. Swenson and Brummond (2000) stated, "Marketing organically produced grains is different from conventional grain marketing. While the conventional grower can deposit a whole harvest at the elevator, organic production is usually contracted with a specific buyer ahead of planting. The marketing skills necessary for organic producers are often different from those for conventional producers." This is in tune with the findings when nearly 39 per cent of the organic farmers sold their products directly to the consumers whom they contracted ahead of planting.

❖ **Problems Faced By Organic Farmers Related To Marketing Of Their Produce :** One of the objectives of the present study was to find out the problems of the farmers related to marketing of organic crop products. The findings in this regard showed that *'Inadequate transport and storage'*, *'Lack of awareness among consumers about its (organic farming) merits'* and *'Inadequate information regarding organic products'* were the problems perceived by an equal percentage of respondents of the plains (Table 3). A small percentage of respondents from the plains , i.e., 7 per cent pointed out some other problems such as *'Poor price fetched by the organic produce in the local market'*. The most severe problem reported by the organic farmers of the plains was the *'High production cost'*, the same being reported by one-third of them. On the other hand, the most severe problem reported by the organic farmers of the hilly regions in marketing of organic crops was *'Unavailability of a separate market area for organic products'*, i.e. this problem was reported by 37 per cent of the respondent farmers (Table 3). Other marketing related problems cited by 25 per cent of the organic farmers in the hilly regions were *'Availability of cheaper alternative food items'* and *'Inadequate transport*

Table 3 : Distribution of Farmers By Problems Perceived In Organic Farming

Problems	Plain(N=24)				Hill(N=48)				Total(N=72)			
	Yes		No		Yes		No		Yes		No	
	N	%	N	%	N	%	N	%	N	%	N	%
Inadequate local buyers	-	-	24	100	2	4.16	46	95.83	2	2.77	70	97.22
Inadequate transport	4	16.68	20	83.4	12	25	36	75.00	16	22.21	56	77.78
Inadequate storage	4	16.68	20	83.4	-	-	48	100.0	4	5.55	68	94.44
High production cost	8	33.36	16	66.66	9	18.7	39	81.25	17	23.19	55	76.39
Consumers lack faith in organic products	-	-	24	100	7	14.5	41	85.42	7	9.71	58	80.56
Availability of cheaper alternatives	-	-	24	100	12	25	36	75	12	16.65	60	83.33
Not a consumer's priority	-	-	24	100	7	14.6	41	85.42	7	9.71	65	90.28
Lack of awareness regarding the merits of OP	4	16.68	20	83.4	10	20.8	38	79.17	14	19.43	58	80.56
Inadequate information	3	12.51	21	87.5	8	16.6	40	83.33	11	15.26	61	84.72
Poor price	6	25	18	75	1	2.08	47	97.92	7	9.71	65	90.28
Separate market area not available	-	-	24	100	18	37.4	30	62.5	18	24.98	54	75

OP* - Organic Produce Source : Primary Data

facilities'. In addition, *'Lack of awareness about merits of organic food among the consumers'* was perceived to be a problematic issue by 21 per cent of the organic farmers. *'High production cost', 'Lack of information', 'Lack of faith in the merits of organic farming and organic foods'* and *'Low priority given to organic food items in the purchase list of the consumers'* were other marketing-related problems cited by nearly one-sixth of the hill farmers (Table 3). These problems were identified by the farmers under an open ended question. The price of the organic products increases due to the high production cost, whereas cheaper alternatives are available in the market. Hence, this affects the marketing of organic products and deeply impacts the profits earned by organic farmers. With reference to the problems faced by farmers in marketing of organic produce, Sebastin (1997) reported that the organic farmers did not get the premium price and there was no separate market for selling of organic products. Furthermore, organic farms were not certified. These were the major problems that were a cause of concern for the organic farmers.

❖ **Testing of The Hypotheses :** The following hypotheses was framed by the investigator to elucidate the association between problems faced in organic farming perceived by the farmers and the location of their farmland.

❖ **H_1: There exists a difference in the problems perceived by organic farmers in the plains and hilly regions of Uttarakhand.**

To test the above hypothesis, the following null hypothesis was formulated. Chi square test was then applied.

❖ **H_{01}: There is no difference in the problems perceived by organic farmers in the plains and hilly regions of Uttarakhand.**

The respondents in the present investigation belonged to the plains and hilly regions of Uttarakhand State. Twenty four respondents belonged to the plains, and the remaining forty eight respondents belonged to the hilly regions. In order to assess the influence of location, i.e., plains or hills on problems perceived in organic farming by the selected farmers, the chi-square test was carried out. The findings summarized in Table 4 show that the computed chi-square value is significant when frequencies of problems reported by the farmers under study were compared by their location, namely, plains and hilly regions. A few problems perceived in organic farming by farmers such as *'Inadequate Storage'*, *'Availability of cheaper alternative products'*, *'Poor price'* and *'Non- availability of separate market area'* were found to be influenced by the location of farming at .01 level of significance. *'Lack of faith in the merits of organic farming and organic foods by the consumers '*, and *'Organic products not a consumers' priority'* were found to be problems associated with the location of farming at .05 level of significance. It can be inferred that the farmers in the

Table 4 : Chi - Square Values Showing The Significance of Problems Perceived By The Selected Farmers In Organic Farming By Location Of Their Farms

S.No.	Problems	Response (Observed)	Plains	Hills	Total
1.	Inadequate Local Buyers	Yes	0	2	2
		No	24	46	70
		Total	**24**	**48**	**72**
		Chi - square value = (1.03)			
2.	Inadequate Transport	Yes	4	12	16
		No	20	36	56
		Total	**24**	**48**	**72**
		Chi - square value = (.64)			
3.	High Production Cost	Yes	8	9	17
		No	16	39	55
		Total	**24**	**48**	**72**
		Chi - square value = (1.89)			
4.	Inadequate storage	Yes	4	0	4
		No	20	48	68
		Total	**24**	**48**	**72**
		Chi - square value = (8.5)**			
5.	Lack of faith in the merits of organic products and organic farming	Yes	0	7	7
		No	24	41	65
		Total	**24**	**48**	**72**
		Chi - square value = (3.87*)			
6.	Availability of cheaper alternate products	Yes	0	12	12
		No	24	36	60
		Total	**24**	**48**	**72**
		Chi - square value = (7.2)**			
7.	Not a consumers' priority	Yes	0	7	7
		No	24	41	65
		Total	**24**	**48**	**72**
		Chi - square value = (3.87*)			
8.	Lack of awareness among the consumers about the merits of organic farming and organic products	Yes	4	10	14
		No	20	38	58
		Total	**24**	**48**	**72**
		Chi - square value = (.178)			
9.	Inadequate information	Yes	3	8	11
		No	21	40	61
		Total	**24**	**48**	**72**
		Chi - square value = (.209)			
10.	Poor price	Yes	6	1	7
		No	18	47	65
		Total	**24**	**48**	**72**
		Chi - square value = (9.6)**			
11.	Non availability of a separate market area for selling organic products	Yes	0	18	18
		No	24	30	54
		Total	**24**	**48**	**72**
		Chi - square value = (12)**			

*Significant at 0.05 level **Significant at 0.01 level Source : Primary Data

Table 5 : Distribution Of The Farmers By Their Overall Satisfaction Levels In Marketing Of Organic Products						
Satisfied or not	**Plain (N=24)**		**Hills (N=48)**		**Total (N=72)**	
	N	**%**	**N**	**%**	**N**	**%**
Satisfied	16	66.72	28	58.24	44	61.07
Not satisfied	8	33.36	20	41.6	28	38.86
Satisfaction With The Price Offered For Organic Crops By Different Buyers						
Different buyers	**Plain (N=24)**		**Hills (N=48)**		**Total (N=72)**	
Consumers	6	25	22	45.76	28	38.86
Retailers	6	25	-	-	6	8.33
Middlemen	-	-	-	-	-	-
Wholesalers	-	-	11	22.88	11	15.27
Government agency	6	25	9	18.7	15	20.82
Arati	-	-	-	-	-	-
Total	**18**	**74.88**	**42**	**87.36**	**60**	**82.8**
Source : Primary Data						

Table 6 : Distribution of Farmers By Organic Farming Under Government Project And NGOs						
Organic farming under project	**Plain (N=24)**		**Hills (N=48)**		**Total (N=72)**	
	N	**%**	**N**	**%**	**N**	**%**
Yes	22	91.74	26	54.08	48	66.62
No	2	8.34	22	45.7	24	33.31
Total	**24**	**100**	**48**	**100**	**72**	**100**
Source : Primary Data						

hilly areas perceived more problems in comparison to the farmers in the plains . Thus, on the basis of the findings, the null hypothesis H01 was partially rejected. It was concluded that the location of the farms did exert an influence on the extent of the problems perceived by the farmers of organic farming considered for the present study.

The organic farmers of the hilly regions perceived the problems - like *'Inadequate storage', 'Availability of cheaper alternative products', 'Poor price' and 'Non - availability of a separate market area for organic products'* - to be of grave concern to them, more than what was considered by the organic farmers of the plains. Inadequate storage resulted in selling crops at a lower price; while availability of cheaper alternative products and non- availability of a separate market area might be the reasons due to which the farmers got a poor price for organic products. The magnitude and seriousness of the above identified problems were greater for small farmers who were not as resourceful and as informed as the large farmers. The large farmers were in a position to overcome the problems on their own, whereas the small farmers, plagued by the aforementioned concerns, found it difficult to survive. They required institutional support to overcome the problems faced by them in organic farming.

❖ **Satisfaction of The Farmers With The Marketing Opportunities For Organic Products And Satisfaction With The Price Offered To Them (By Buyers) For Organic Crops :** The investigator probed further to gain insight into the satisfaction obtained by the farmers in marketing their organic products in different markets. The respondents were asked to answer on a two point scale with "satisfied" and "not satisfied". The percentage of satisfied respondents was 61 while nearly 39 per cent of the respondents were not satisfied out of the total sample studied (Table 5).

The analysis of the data depicted that a little less than half of the respondents from the hills and one-fourth from the plains were satisfied with the price they received from the consumers who were buyers of the products (Table 5). About 25 per cent of the respondents from the plains were satisfied with the retailers located in the hilly regions. No respondent was satisfied with the middlemen in both the regions. In the hilly regions, nearly 23 per cent of the respondents were satisfied with the wholesalers, but this was not the case with the respondents of the plains. Nearly 39 per cent and 21 per cent of the total respondents were satisfied with the payments received from both the consumers

and the government agency respectively. The findings showed that a little more than one-third of the farmers were satisfied with the price paid by the consumers for their products. Retailers and wholesalers also were seen as distribution channels for marketing of organic products (Table 5).

❖ **Organic Farming Supported By The Government :** There are many projects which are run in the villages for promoting organic farming by the government like Diversified Agriculture Support Project (DASP), Organic Certification of farmers in Uttarakhand and Uttarakhand Organic Commodities Board. The investigator probed to find out whether the respondents pursued organic farming under any project. It was observed that the majority of the respondents (two-third) were involved in organic farming under the macro mode project of UTDASP (Table 6). In the plain regions, a majority of the respondents, i.e., 92 per cent were practicing organic farming under this project, whereas a little over half of the respondents (54 per cent) in the hilly regions were practicing organic farming under the same. The remaining respondents pursued organic farming on their own without any support from any type of project. The farmers who were growing organic crops under the macro mode project of UTDASP, many of them were selling their crops under the project only. It was important to know whether the farmers were growing organic products under the project or not as the government was facilitating farmers for marketing of their organic products through the above-mentioned project. Farmers were paid a fixed price by the government for the products sold under the project.

CONCLUSION

The investigator made efforts to find out the marketing practices adopted by the farmers to sell their organic crops. It was found that the local market and *Mandi* were the market places for selling of organic products. The percentage of satisfied farmers with marketing of organic products were slightly more in the plains than in the hilly regions. The distribution channels that were reported by the respondents in the plains for marketing of organic products were government agency, direct sale to consumers, retail shops and wholesalers. On the other hand, the respondent farmers from the hills were dependant on *Arati*, direct sale to consumers, government agency, wholesalers and retailers. Other channels like private middlemen were not a popular means to sell organic products by the farmers.

The respondents identified many problems related to marketing and these were : *"Inadequate transport and storage", "High production cost", "Unavailability of separate market area for selling of organic produce"*. The most prominent problem in marketing of organic crops reported by the respondent farmers from the plains was related to the *"High production cost"* that lead to low profit or no profit. The largest proportion of hill respondents reported the *"Unavailability of an earmarked marketplace/ shop for selling the organic produce"* to be their biggest concern.

The computed chi-square value was significant for the extent of problems perceived by the farmers of Uttarakhand in organic farming by location - plains and hills. In other words, the respondents of the plains were found to be significantly different from the respondents of the hilly regions in the extent of some problems perceived in organic farming such as - *'Inadequate storage', 'Lack of faith in the merits of organic farming and organic foods', 'Availability of cheaper alternative food items', 'Not a consumers' priority', 'Poor price'* and *'Unavailability of a separate market area for selling the organic produce'.*

IMPLICATIONS OF THE STUDY

1) Separate Market Area : To boost the marketing facility for organic products, separate shops/earmarked market place should be made available for organic products. When farmers have an appropriate market and buyers for their products, they are also assured about obtaining appropriate prices for their products. Availability of a separate market area will support the organic farmers in getting better prices for their products and it can resolve the problem of availability of alternative cheaper products in the market to some extent. Outside agencies should be linked with the association of organic farmers to buy their products. Especially for the farmers from hilly regions, this facility should be provided on priority as transportation is not easy in the hills. Organic farmers ought to be mobilized to form their associations as they can achieve many things like favorable pricing policy through joint efforts rather than individual ones. Concerned Government departments ought to come forward to assist the organic farmers and promote organic farming as there are multiple benefits of furthering a social cause of public health through organic food, an economic cause of enhancement of earnings of farmers through organic food production and an environmental cause of sustenance of soil fertility and reduction in the use of chemical fertilizers, pesticides and the like apart from other

benefits.

2) Inadequate Information : An objective of this study was to address marketing constraints faced by the farmers in marketing of organic products. The farmers wanted to be equipped with thorough knowledge of organic farming practices, certification and marketing of organic produce. An efficient training program is required for organic farmers. They must be aware of grading standards, sampling techniques and production techniques necessary to meet the high standards of production that organic food demands.

3) Consumer Education : Education is needed to provide information to the consumers about organic foods if demand is to increase. The consumer, in most cases, pays a premium for organically grown food because of his concern for the environment (Organic Food Business News, 1992). The information should indicate that organic products are raised under conditions where chemicals or synthetic fertilizers are not used, and conditions which promote a safer and healthier environment. It should be borne in mind that positive advertisement is an important part of consumer education.

4) Transport and Storage Facility : Harvest equipment, storage area, packaging and transportation facilities must comply with NPOP guidelines. There is a dearth of transport and storage facility for the organic crops raised, especially those with a low shelf life. It is imperative that cold chain transport facility and storage facility based on new and renewable energy are in place for farmers' use to lead to the promotion of organic farming in hilly terrains like that of Uttrakhand state. So, proper transportation and storage facilities should be provided to the farmers so that they can get good returns for their produce.

STRATEGIES FOR MARKET IMPROVEMENT

❖ Development of the rural market is an absolute necessity for organic products, where the arrangement for farmers-to-consumers direct selling can be made to ensure realization of a premium price. It will cut the profit of the middlemen or wholesalers or retailers. Consumers can also get organic products at a better price.

❖ Organic farmers in the hilly regions perceived a huge problem of transport facilities. Due to this constraint, organic farmers end up selling their organic products at a lower price because of the lack of facilities to transport organic products from the village to the main market or *Mandi*. Hence, there should be proper facilities to transport organic products from the hills to the main market.

❖ Involvement of government organizations or NGOs can be encouraged for developing organic farming and marketing in India. These organizations can work as intermediary channels for inspection and certification of organic products. Also, they can help in creating awareness about organic farmers among people. Additionally, these organizations would be able to create a platform where organic farmers can directly contact the consumers.

❖ The findings of the present research revealed that organic farmers perceived some problems which are related to lack of awareness and faith among the consumers regarding organic products. These problems can be minimized through adequate publicity of organic products and its merits to the consumers. Subsequently, campaigns should be formulated to create awareness regarding organic products among the consumers.

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