

## Profile of Peri-urban and Rural Dairy Farmers : A Comparative Analysis

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### ABSTRACT

This study was conducted in Faizabad district of Uttar Pradesh to study the socio-economic profile of peri-urban and rural dairy farmers with a sample of 120 dairy farmer (60 peri-urban + 60 rural) selected from eight villages selected through probability proportionate sampling technique on the basis of herd size. The study revealed that the majority of peri-urban (88.33%) and rural dairy farmers (75%) were literate with the dominancy of joint family system (68.33% in peri-urban and 65% in rural). The majority of peri-urban dairy farmers (63.33%) and rural dairy farmers (56.66%) were found to be medium size family *i.e.* 5-8 members; and possessed pucca house 65 per cent and 61.66 per cent, respectively. The majority of both type of farmers (90% and 78.33%) reported agriculture as their main occupation. A majority of the peri-urban dairy farmers (46.66%) was found to be having marginal land holding, while rural dairy farmers (33.33%) were found in each marginal and large land holding categories. The annual income of majority of the peri-urban and rural dairy farmers (45% and 40%) was found in the category of ₹ 60,001/- to 90,000/- and 30,000/-1 to 60,000/- respectively. The dominant mass media information sources were observed to be radio followed by mobile and television. Majority of peri-urban dairy farmers (55%) and rural dairy farmers (73.33%) were observed to be in the medium category of material possession. The medium level of scientific orientation, achievement motivation, economic motivation and value orientation were found among both type of respondents.

**Key words:** Socio-economic profile, peri-urban, rural farmers and dairy farmers.

### INTRODUCTION

Dairy sector contributes significantly in generation of employment opportunities and supplementing the income, particularly for small and marginal farmers and landless labourers of rural India, besides providing food security. Peri-urban is an area or village or habitation located in the perimeter of the urban area having partial or complete influence of urbanization. The rearing of cattle and dairying has become a subsidiary occupation for many households with agriculture for improving the socio-economic condition of rural people. The dairying requires a lot of skilled and unskilled manual labour for its various kinds of activities like maintenance of animal, feeding, milking, cleaning of cattle sheds, taking care of calves, processing of milk and marketing, *etc.* Thus, the employment potential is higher in dairy sector. A peri-urban area is not only a zone of direct impact experiencing the immediate impacts of land demands from urban growth and pollution, but is also a wider market-related zone of influence that is recognizable in terms of the handling of agricultural and natural resource products (Simon *et al.*, 2006). In this context, the present study was undertaken with the objective of exploring comparative analysis of profile of peri-urban and rural dairy farmers.

### METHODOLOGY

The study was conducted during 2011-2012 among purposively selected peri-urban and rural dairy farmers of Faizabad district (U.P.). At first, the list of all the villages in the selected district was prepared and then four villages situated near the road in four directions (East, West, North and South) within 5 kilometers away from Nagar Palika boundary were randomly selected as peri-urban villages namely, Dabaseber, Keshavpur, Mishran and Ghatampur.

In the same manner, four villages, namely, Bargadiya, Rajepur, Amauna and Bikapur situated in the same directions beyond 10 kilometers from Nagar Palika boundary were randomly selected as rural areas. At last stage of sampling, the list of respondents were prepared separately for each sample village and thus, a total of 120 dairy farmers (60 peri-urban + 60 rural) from eight sample villages were selected through probability proportionate sampling technique on the basis of herd size.

The data were collected through stockyard and pre-tested interview schedule in face to face situation. Descriptive statistics was used for the analysis of data.

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**Table 1: Distribution of respondents according to personal, social and economical variables**

Variables	Respondents (n=120)			
	Peri-urban (n=60)		Rural (n=60)	
	f	%	f	%
<b>Education</b>				
Illiterate	07	11.66	15	25.00
Literate	53	88.33	45	75.00
Primary	01	01.66	00	00.00
Junior high school	11	18.33	19	31.66
High school	17	28.33	10	16.66
Intermediate	12	20.00	08	13.33
Graduate	10	16.66	05	08.33
Post graduate	02	03.33	03	05.00
Total	60	100	60	100
<b>Family type</b>				
Nuclear family	19	31.66	21	35.00
Joint family	41	68.33	39	65.00
Total	60	100	60	100
<b>Family size</b>				
Small (Up to 4 members)	13	21.66	09	15.00
Middle (5 to 8 members)	38	63.33	34	56.66
Large (9 and above)	09	15.00	17	28.33
Total	60	100	60	100
<b>Housing pattern</b>				
Kaccha	04	06.66	07	11.66
Mixed	17	28.33	16	26.66
Pucca	39	65.00	37	61.66
Total	60	100	60	100
<b>Land holding</b>				
Marginal (below 1 ha)	28	46.66	20	33.33
Small (1-2 ha)	10	16.66	14	23.33
Medium (2-4 ha)	05	08.33	06	10.00
Large (4 ha and above)	17	28.33	20	33.33
Total	60	100	60	100

**Annual income**

Up to ₹ 30,000	03	05	11	18.33
₹ 30,001 to 60,000	18	30	24	40
₹ 60,001 to 90,000	27	45	19	31.66
₹ 90,001 to 1,20,000	09	15	04	06.66
₹ 1,20,001 and above	03	05	02	03.33
Total	60	100	60	100

**Social participation**

No participation	45	75.00	46	85
Member in one organization	13	21.66	14	15
Members in two organizations	02	03.33	00	00
Total	60	100	60	100

**Over all materials possession**

Low (up to 25)	11	18.33	08	13.33
Medium (26 to 51)	42	70.00	44	62.85
High(52 and above)	07	11.66	08	13.33
Total	60	100	60	100

**Occupation**

Occupation	Main	Subsidiary	Main	Subsidiary
Agril. Labour	00.00	0.0	03.33	05.00
Service	01.66	00.00	01.66	00.00
Agriculture	90.00	08.33	78.33	16.66
Dairy	08.33	91.66	16.66	78.33
Total	100	100	100	100

It is clear from the Table-1 that the literates among the peri-urban and rural dairy farmers were observed to be 88.33 per cent and 75 per cent respectively while illiterate were observed to be 11.66 per cent and 25 per cent respectively. The literacy percentage in the peri-urban dairy farmers was found more as compared to rural dairy farmers because peri-urban farmers have more access to educational institutions as the most of institutes are located in and around urban areas.

The majority of the peri-urban dairy farmers (68.33%) belonged to joint family compared to rural dairy farmers (65%). The majority of peri-urban dairy farmers (63.33%) and rural dairy farmers (56.66%) were found under middle family size category *i.e.* 5-8 members. The findings are similar with the findings of Gautam *et al.*, 2007. Majority of peri-urban dairy farmers (65%) and rural dairy farmers (61.66%) possessed pucca house.

A majority (46.66%) of the peri-urban dairy farmers belonged to the marginal land holding category, in the case of rural dairy farmers, the majority of the respondents (33.33%) were found in marginal as well large land holding categories. The annual income of majority of the peri-urban farmers (45%) was found in the categories of ₹ 60,001/- to 90,000/-, followed by 30 per cent in ₹ 30,001/- to 60,000/-while, in the case of rural dairy farmers, 40 per cent were in the category of ₹ 30,001/- to 60,000/- followed by 31.66 per cent in ₹ 60,001/- to 90,000/-. Hence, the trend shows that the peri-urban farmers dominated in annual income over the rural dairy farmers. The majority of the peri-urban respondents (21.66%) had participation in one organization followed by two organizations (3.33%) whereas, 75 per cent farmers were had no participation in any organization. Likewise, in case of rural dairy farmers, 15 per cent were having participation in one organization and 85 per cent had no participation in any organization. Data show that the majority of peri-urban dairy farmers (55%) were observed in the medium category of material possession followed by high (24.5%) were as, majority of rural dairy farmers (73.33%) were observed in the medium category of material possession followed by high (13.33%) respectively. These finding are in line with the finding of Raval and Chandawat, (2011). Table 1 further indicated that a overwhelming majority of the peri-urban dairy farmers (90%) had agriculture as their main occupation followed by dairy (8.33%) while, in case of subsidiary occupation, the large majority of farmers (91.66%) adopted dairy followed by agriculture (8.33%) respectively. Likewise, in case of rural dairy farmers, the majority of the respondents (78.33%) reported agriculture as their main occupation followed by dairy (16.66%) while, in case of subsidiary occupation, the large majority of farmers (83.33%) adopted dairy followed by agriculture (16.66%).

**Table 2: Distribution of respondents according to utilization of information sources**  
n=120

Particulars	Peri-urban (n=60)		Rural (n=60)	
	Mean scores	Rank order	Mean scores	Rank order
<b>Formal sources</b>				
V.D.Os.	0.21	IX	0.16	VIII
B.D.Os.	0.15	X	0.15	X
A.D.Os.	0.16	VIII	0.15	IX
Secretary	0.33	VII	0.34	VII
Gram pradhan	0.42	IX	0.45	IV
Cooperative society	0.44	IV	0.45	VI
Banks	0.55	I	0.54	I

Mandi samiti	0.51	II	0.45	III
Agril. scientist	0.09	XI	0.11	XI
Kishan sahayak	0.41	VI	0.46	II
Facilitators	0.45	III	0.45	V
<b>Average</b>	<b>0.33</b>	<b>III</b>	<b>0.33</b>	<b>III</b>
<b>Informal sources</b>				
Family members	0.87	I	0.88	I
Neighbour	0.77	II	0.72	II
Friends	0.76	III	0.68	IV
Relatives	0.73	IV	0.65	V
Progressive farmers	0.73	V	0.70	III
<b>Average</b>	<b>0.77</b>	<b>I</b>	<b>0.72</b>	<b>I</b>
<b>Mass media exposure</b>				
Radio	0.93	I	0.92	I
T.V.	0.90	II	0.71	II
Mobile	0.83	III	0.69	III
Film show	0.61	IV	0.56	IV
Farm magazines	0.1	VIII	0.11	VIII
Posters	0.28	V	0.34	V
Farmers fair	0.24	VII	0.24	VII
Demonstrations	0.24	VI	0.25	VI
<b>Average</b>	<b>0.46</b>	<b>II</b>	<b>0.42</b>	<b>II</b>

The data in Table 2 revealed that the extent of contact of respondents with different information sources used by them for general information as well as about various practices of dairy farming. Among formal sources, the peri-urban dairy farmers were also found in the order viz., banks (0.55), *mandi samiti* (0.51), facilitator (0.45), cooperative (0.44), gram pradhan (0.42), *kishan sahayak* (0.41), secretary (0.33), A.D.Os. (0.11), V.D.O (0.21) and B.D.Os. (0.15) respectively and the rural dairy farmers was found in descending rank order i.e. bank (0.54), kishan sahayak (0.46), *mandi samiti* (0.45), gram pradhan (0.45), facilitators (0.45), cooperative (0.45), secretary (0.34), V.D.Os (0.16), A.D.Os. (0.15), B.D.Os. (0.15), and agril. scientists (0.11). The contact of peri-urban dairy farmers with informal sources was found in descending the ranke order viz., family members (0.87), neighbors (0.77), friends (0.76), relatives (0.73), and progressive farmers (0.73). Like-wise, rural dairy farmers were found in the order i.e. family members (0.88), neighbor (0.72), relatives (0.68), friends (0.65), and progressive farmers (0.70).

In case of mass media sources of information, the peri-urban dairy farmers were found in the rank order of radio (0.93), T.V. (0.90), mobile (0.83), film shows (0.61),

poster (0.28), demonstrations (0.24), farmer's fairs (0.24), farm magazine (0.1) and circular letters (0.03). Likewise, rural dairy farmers were found in descending order of radio (0.92), T.V. (0.71), mobile (0.69), film show (0.56), posters (0.34), demonstrations (0.25), farmers fairs (0.24) and farm magazine (0.11). The findings indicate that more powerful and useful sources of information among the dairy farmers were informal sources followed by mass media sources and formal sources.

**Table 3: Distribution of respondents according to dairy experience, herd size and milk production**  
n=120

Categories	Peri-urban (n=60)		Rural (n=60)	
	f	%	f	%
<b>Dairy experience (Years)</b>				
Low (up to 6)	15	25.00	05	08.33
Medium (7 to 18)	40	66.66	48	80.00
High (19 and above)	05	08.33	07	11.66
Total	60	100.00	60	100.00
<b>Herd size (Animals)</b>				
Small (up to 1)	13	21.66	20	33.33
Medium (2 to 5)	40	66.66	36	60.00
Large (above 5)	07	11.66	04	06.66
Total	60	100.00	60	100.00
<b>Milk production (Litres)</b>				
Total		872		777
Per animal		6.70		7.33
Per person		2.05		2.06
Per family		14.53		12.95

Table 3 indicated that the majority of peri-urban dairy farmers (66.66%) and rural dairy farmers (80%) had medium level of farming experience. Most of the peri-urban dairy farmers (66.66%) had medium herd size followed by small (11.66%) and large (21.66%) respectively, but the majority of rural dairy farmers (60%) had medium herd size followed by small (6.66%) and large (33.33%), respectively. The Table-3 reflects that the total milk production with peri-urban dairy farmers was found to be 872 litres, while with rural dairy farmers it was 777 litres and the per animal milk production with peri-urban was 6.70 litres as against 7.33 litres with rural dairy farmers. The per family member milk availability and per family milk production was found to be 2.05 litres and 14.53 litres in case of peri-urban while, 2.06 litres and 12.95 litres in case of rural dairy farmers.

**Table 4: Distribution of respondents according to psychological profile**  
n=120

Categories (Scores)	Peri-urban (n=60)		Rural (n=60)	
	f	%	f	%
<b>Scientific orientation</b>				
Low (up to 21)	07	11.66	16	26.66
Medium (22 to 25)	42	70.00	37	61.66
High (26 and above)	11	10.33	07	11.66
<b>Achievement motivation</b>				
Low (up to 16)	11	18.33	18	30.00
Medium (17 to 20)	40	66.66	36	60.00
High (21 and above)	09	15.00	06	10.00
<b>Economic motivation</b>				
Low (up to 21)	16	26.66	23	38.33
Medium (22 to 25)	41	68.33	35	58.33
High(26 and above)	03	05.00	02	3.33
<b>Value orientations</b>				
Low (up to 31)	09	15.00	16	26.66
Medium (32 to 36)	39	65.00	34	56.66
High (37 and above)	12	20.00	10	16.66

Table 4 revealed that the majority of peri-urban dairy farmers (70%) had medium level of scientific orientation followed by high (10.33%) and low (11.66%) whereas majority of rural dairy farmers (61.66%) had medium level of scientific orientation followed by high (11.66%) and low (26.66%). The majority of peri-urban dairy farmers (66.66%) had medium level of achievement motivation followed by high (15%) and low (18.33%) whereas majority of rural dairy farmers (60%) had medium achievement motivation followed by high (10%) and low (30%). The majority of peri-urban dairy farmers (68.33%) had medium economic motivation followed by high (5%) and low (26.66%) whereas majority of rural dairy farmers (58.33%) had medium economic motivation followed by high (3.33%) and low (38.33%). The majority of the peri-urban dairy farmers (65%) and rural dairy farmers (56.66%) had medium level of value orientations followed by high level (20%) and (16.66%) respectively.

## CONCLUSION

The study revealed that the peri-urban dairy farmers were better in literacy, annual income, social participation, overall material possession, as compared to the rural dairy farmers. The rural dairy farmers had more dairy experience and per animal milk production when compared to the peri-urban dairy farmers. Peri-urban and

rural dairy farmers were observed to have joint family, middle family size, pucca houses and almost similar information sources or extension contact. The majority of peri-urban and rural dairy farmers had agriculture as their main occupation followed by dairying as subsidiary occupation. The majority of peri-urban and rural dairy farmers possessed medium herd size. The both type of dairy farmers had medium level of scientific orientation, achievement motivation, economic motivation and value orientations.

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