

Food Intake of Pre-Schoolers of Maharashtra and Haryana: A Comparative Study

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Introduction

Dietary intakes of pre-school children continue to be affected by economic and social factors. Nutritional status largely depends on the feeding habits of the community which are influenced by social customs, beliefs, superstitions, religion, cultural behaviour, changes in the living environment, mass communication and the socio-economic status of the families. These socio-cultural factors play a vital role on the ecology of mal-nutrition over and above the nutritional and medical factors.

Few studies were conducted to study the effect of some socio-economic factors on the nutrient intake of pre-school children (158 males and 142 female children) belonging to urban-slum community near BHU, Varanasi. The analysis revealed that the mean intake of protein, carbohydrate, fat, calories, vitamin C, calcium and iron was higher in the case of children from nuclear families than their joint family counterparts. As the per capita income improved, the nutrient intake became richer, which sufficiently fits with general observation as well.

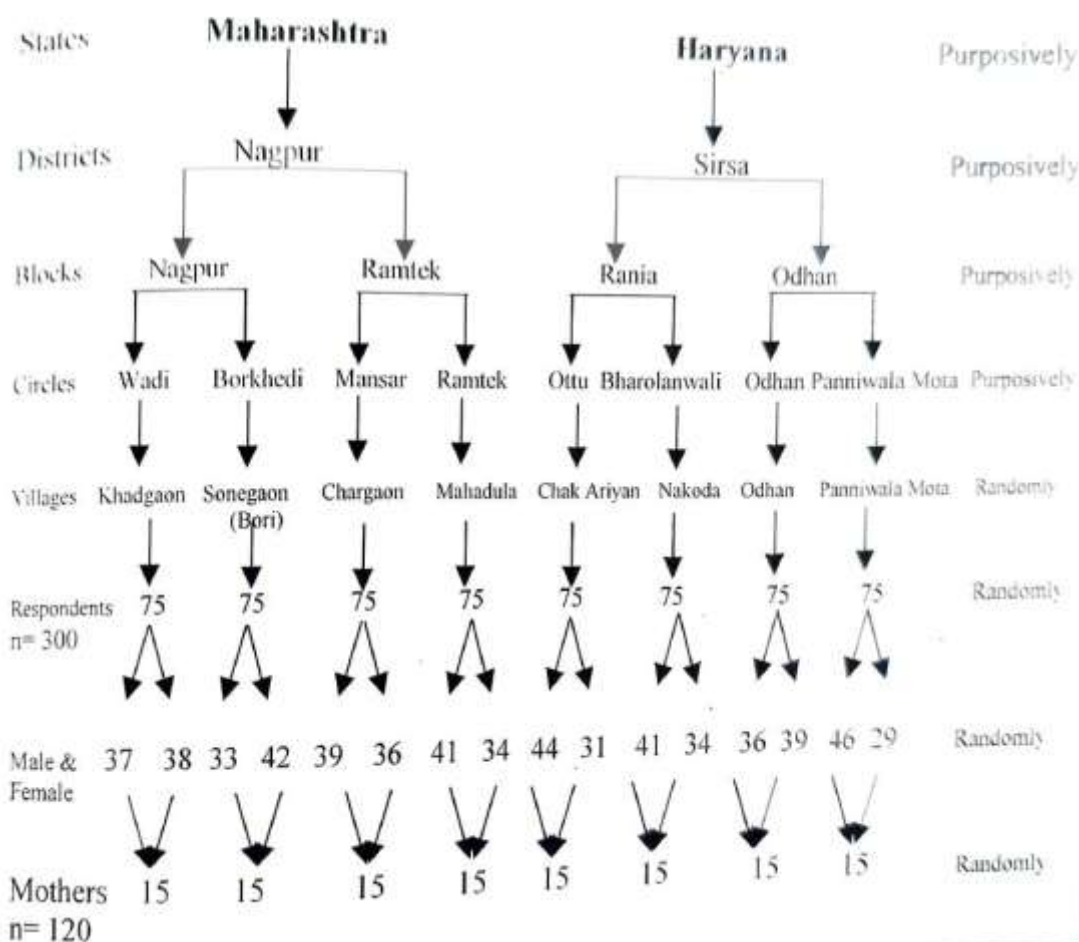
Dietary habits of vulnerable set of population must be improved for long term effect on the health of children by imparting nutrition education. Rigid dietary habits need correction and only systematic nutrition education programme can bring changes in dietary habits. Nutritional awareness is essential to bring changes in dietary habits and creating nutritional awareness entirely depends on education and training. Nutritional awareness results not only in gain in knowledge and improvement in feeding practices of children (Carruth and Skinner, 2001) but it also helps to improve the dietary status of the family as the mother's concepts about right diet and how to provide it are changed. Nutrition education has been realized as one of the essential means of helping people to help themselves to improve or maintain their health as it helps in developing a positive attitude towards nutrition. So, nutrition education is essential for all age groups and at all times. Hence, there is a need to pay greater attention to educational interventions.

In view of national growth and development, it becomes essential to maintain physical power of pre-school children at an optimal level. For this purpose, monitoring the health and growth rate of pre-school children is one of the most simple, reliable and important parameter. Although few studies for estimating the nutritional status in pre-schoolers have been conducted in some states of India but no systematic comparative study seems to have been carried out in different districts of Haryana and Maharashtra to estimate the nutritional status and to correlate this prevalence with dietary and other factors. Keeping all these perspectives into consideration, the present study was undertaken.

Methodology

Geographical Location:

Sampling Procedure:



Result & Discussion

Effect of various socio-economic variables on food intake of pre- school children

1. Income-effect on food intake

Income is considered to be most important parameter in estimation of one's food consumption pattern. Table 1 shows that children (3 to 5 years) of low-income group families were taking significantly ($P < 0.05$) more amount of cereals (142.89 and 164.81 g/day) than the children of medium-income group (119.07 and 124.03 g/day) and high- income group (126.29 and 131.88 g/day), respectively in Haryana and Maharashtra. The amount of cereals consumed by children belonging to all the income groups was less than the RDI of 165 g/day (NIN, 2020). The consumption of pulses was found higher in children who were belonging to medium income group i.e. (31.91 and 30.23 g/day) than the children of high- income and low-income groups in Haryana and Maharashtra, respectively.

The intake of roots & tubers and sugar & Jaggery by pre-school children (3 to 5 years) belonging to various income groups viz. high-income group, medium-income group and low-income group did not vary significantly ($P < 0.05$) among themselves except milk & milk products in high-income group in Maharashtra. Intake of other vegetables was higher in children belonging to medium income group and high-income group.

Fruits' intake of children belonging to low-income group was lower as compared to children who belonged to medium-income and high-income groups. However, fruits' intake of pre-school children from medium income and high-income group was almost similar in Haryana.

No significant ($P < 0.05$) differences were drawn among various income and RDI in relation to consumption of fats & oils.

George *et al.* (2000) also revealed that purchasing power is one of the factors that influence the nutritional status of pre-school children in Kerala.

2. Type of family-effect on food intake

The family being the basic unit of social structure serves as an important of socialization and thereby social control is included amongst children. The type of family provides an opportunity to develop a specific type of personality disposition.

The results indicated in Table 2 revealed that though the intake of cereals, pulses, roots & tubers, other vegetables, milk & milk products and Sugar & Jaggery was a little higher among children belonging to nuclear families than those from joint families but the differences were not significant ($P < 0.05$). Similarly, daily mean intake of green leafy vegetables was higher among children belonging to joint families than those from nuclear families in both the States. Children belonging to joint families had more intakes of fats & oils in their daily diets in Haryana when compared to children from nuclear families while intake of rest of the food items was almost similar. Similar findings have been observed by Jood *Etal.*, (2000).

3. Size of family-effect on food intake

The size of family plays an important role in performing and directing the important activities within the household and in the community as well. The size of family often influences distribution of food among family members (Table 3).

Findings of the present study indicated that the children (3 to 5 years) belonging to medium size families consumed more amount of cereals followed by children from small and large families in Haryana while in Maharashtra, cereals consumption was more in large families followed by medium and small families. Daily intake of roots & tubers, milk & milk products and fats & oils by children was not significantly ($P < 0.05$) affected by the size of family in both the States. On the other hand, size of family did affect daily consumption of other vegetable. Children belonging to small families were taking higher amount of other vegetables and fruits than those belonging to large size families. Consumption of fruits was found higher among children belonging to small and medium size families. Sugar & Jaggery intake was also similar children from medium and large families in Haryana. However, children belonging to medium size families had higher intake of pulses in daily diet when compared to small and large size families in Haryana and Maharashtra. The present findings are in agreement with those Agrawal *etal.*, 2001; Ortega *etal.* (2000); Watt *etal.* (2000) and Carruth and Skinner (2001).

4. Caste effect on food intake

Caste has an indirect effect on the food intake. The mean cereal Consumption was found to be higher among children belonging to lower caste (143.14 and 161.32 g/day) and middle caste (137.03 and 156.17 g/day) than those from higher caste (124.36 and 143.06 g/day), respectively in Haryana and Maharashtra. The type of caste did not affect the daily consumption of roots & tubers, and sugar & Jaggery among pre-school children (3 to 5 years) in Haryana. In case of roots & tubers it was true in Maharashtra also (Table 4).

Children belonging to lower caste as well as middle caste had almost similar daily pulses' intake but were lower when compared to children from upper caste. Non-significant ($P < 0.05$) differences were observed in the consumption of other vegetables in all groups (Table 4.4.2.4). Children belonging to middle caste (53.47 g/day) had more daily intake of other vegetables followed by those from lower caste (37.36 g/day) and upper caste (21.46 g/day) in descending order in Haryana. However, children belonging to lower caste were consuming fewer amounts of milk & milk products and fats & oils than those from middle and upper caste in Haryana and Maharashtra. Intake of milk & milk products and fats & oils intake of children from middle as well as upper castes was almost similar in Haryana.

Lower intake of foodstuffs viz. pulses; milk & milk products and fats & oils among children of lower castes may be due to low availability of these foods, low purchasing power and also due to presence of some food fads and fallacies regarding these foods, among lower caste families. Similar findings have been reported by Golder *et al.*, (2001)

5. Education of mother-effect on food intake

Mother being the real teacher, preacher and being closest to the children in the families, can provide greater care especially in developing and establishing their food habits and to more so if she is educated and nutritionally oriented.

Table 5 shows that the consumption of roots & tubers by the children whose mothers were educated up to primary (57.79 and 58.27 g/day), middle (56.29 and 56.67 g/day), matric (53.85 and 60.37 g/day) and graduate (53.89 and 56.34 g/day) level was higher than those having illiterate mothers (36.32 and 35.89 g/day) in Haryana and Maharashtra, respectively. The intake of green leafy

vegetables was higher amongst children whose mothers were educated up to middle, matric or graduation level as compared to illiterate mothers in both the States. The fruits consumption in Haryana was better among children whose mothers were educated up to middle level (38.67 g/day) followed by those having mother educated up to graduate (20.37 g/day), matric (19.31 g/day), primary (10.17 g/day) and illiterate (9.64 g/day) level. The consumption of milk & milk products in Haryana was almost similar among children having mothers who were not educated at all or educated up to primary or matric level. Children having mothers educated up to middle level were consuming maximum amount of milk & milk products in Haryana. In Maharashtra, fruits consumption was more among children of graduate mothers (31.19 g/day) followed by middle level (21.65 g/day), matric (20.67 g/day), primary (19.69 g/day) and illiterate (14.39 g/day). Maximum milk & milk products consumption was among children of graduate and matric educated mothers in Maharashtra.

It was observed that higher the educational status of mothers of the children more was the consumption of fats & oils in both States. However, the intake of cereals, pulses, other vegetables and sugar & Jaggery by the subjects was not affected by the mother's education level in Haryana. The higher intake of green leafy vegetables, fruits, milk & milk products and fats & oils was observed among children whose mothers were educated in Haryana and Maharashtra. This may be due to the fact that mothers with the rise in educational status become more conscious and aware about requirement of protective foods in the diet of children. The present findings are consistent with those reported by Kersting *et al.* (2001).

6. Mother's working status-effect on food intake

Table 6 depicts that higher intake of cereals and sugar & Jaggery was observed among children of working mothers than those of non-working mothers in Haryana. The working status of mothers had no significant ($P < 0.05$) effect on the intake of pulses, roots & tubers, other vegetables and milk & milk products in Haryana and Maharashtra. However, children, whose mothers were housewives had higher intake of fats & oils in Maharashtra.

According to previous study carried out by Singh and Aggrawal (2001), it was found that diet of pre-school children of the non-working mothers was found to have a significantly higher nutritional rating than the pre-school children of working mothers.

7. Occupation of father-effect on food intake

Occupation, a person's functional status, life style, power, the prestige in society, has a bearing impact upon his food consumption pattern and practices including food preference and prejudices.

The data presented in Table 7 reveal that children whose fathers were labourers were consuming better amount of cereals (152.92 and 178.89 g/day) than those whose fathers were engaged in farming, business, service and caste occupation in Haryana and Maharashtra, respectively. The children whose fathers' occupation was service, business or farming had almost similar cereal consumption (117.88, 118.34 and 126.70 g/day) in Haryana State.

Children whose fathers were doing service. consumed higher amount of roots & tubers than those whose fathers were labourers, in business or involved in caste occupation in Haryana. Fathers' occupation whether farming or business, did not affect the consumption of roots & tubers of the children in Maharashtra. The children, whose fathers were doing service, consumed more amount of other vegetables than those whose fathers were farmers or labourers in Haryana. But significant ($P < 0.05$) difference when compared with RDA was observed among children whose fathers were involved in various occupation viz farming, service, business, caste occupation in Maharashtra. consumption of fruits was found lower in children whose fathers were labourers (8.87 and 12.66 g/day) than those whose fathers were farmers or doing service or business (14.67 to 21.25 g/day) in Haryana and Maharashtra, respectively. Children having their fathers either in service or doing farming had higher intake of fats & oils than those children whose fathers were labourer or in business in both the States.

The consumption of sugar & Jaggery in daily diets by children whose fathers were labourer or doing farming was higher than those whose fathers were in service or in business in Maharashtra, respectively. However, the intake of green leafy vegetables by the children was not affected by fathers' occupational status.

The present findings are in agreement with those of Rahman *et al.* (2004)

Table 1 Effect of income on food intake of pre-school children (3 to 5 years)

HARYANA STATE				
S.N.	Foodstuffs	Daily mean food intake (g)		
		LIG (n=222)	MIG (n=56)	HIG (n=22)
I.	Cereals ^{NS}	142.89±40.1	119.07±40.3	126.29±39.5
II.	Pulses ^{NS}	17.09±102.4	31.91±11.7	20.36±12.7
III.	Roots & tubers ^{NS}	40.83±41.8	49.33±26.9	41.35±73.6
IV.	Other Vegetables ^{NS}	24.66±51.3	40.68±42.5	48.24±39.2
V.	Green leafy vegetables**	2.19±6.1	2.48±5.7	2.14±4.6
VI.	Fruits**	10.25±24.4	15.60±29.8	17.69±14.1
VII.	Milk & Milk products ^{NS}	366.36±140.6	377.17±142.1	375.47±116.8
VIII.	Fats & oils ^{NS}	17.89±8.5	20.38±7.0	22.24±10.2
IX.	Sugar & Jaggery ^{NS}	23.17±6.3	22.76±8.3	22.24±6.5
MAHARASHTRA STATE				
I.	Cereals ^{NS}	164.81±38.6	124.03±41.3	131.88±41.7
II	Pulses ^{NS}	17.05±12.6	30.23±49.3	20.08±13.6
III	Roots & tubers ^{NS}	42.85±25.2	51.35±50.3	49.67±48.3
IV	Other Vegetables ^{NS}	12.24±24.5	16.63±23.9	18.01±10.3
V	Green leafy vegetables**	3.00±4.8	1.99±5.2	1.40±6.8
VI	Fruits**	9.64±15.9	14.03±3.6	18.91±12.3
VII	Milk & Milk products ^{NS}	52.39±42.7	60.57±51.3	101.17±99.3
VIII	Fats & oils ^{NS}	9.75±12.3	15.28±9.3	18.36±11.3
IX	Sugar & Jaggery ^{NS}	18.32±12.8	19.27±9.8	20.67±8.7

Table 2 : Effect of type of family on food intake of pre-school children (3 to 5 years)

HARYANA STATE				
Sr. No.	Foodstuffs	Daily mean food intake (g)		'Z' Value
		Nuclear (n=152)	Join (n=148)	
i)	Cereals	135.94±42.6	129.18±40.2	0.3246 ^{NS}
ii)	Pulses	22.41±10.5	18.94±61.5	0.1511 ^{NS}
iii)	Roots & tubers	43.46±33.6	41.40±68.4	0.1957 ^{NS}
iv)	Other Vegetables	38.13±55.1	37.12±44.4	0.0853 ^{NS}
v)	Green leafy vegetables	1.96±7.3	2.89±4.1	23.2088**
vi)	Fruits	13.01±16.8	11.85±21.9	3.9916**
vii)	Milk & Milk Products	379.60±141.1	371.03±121.7	0.1239 ^{NS}
viii)	Fats & Oils	18.64 ±7.7	20.45 ±10.1	0.6330 ^{NS}
ix)	Sugar & Jaggery	23.52 ±7.3	22.33 ± 6.7	1.5980 ^{NS}
MAHARASHTRA STATE				
		(n=156)	(n=144)	
i)	Cereals	140.19±41.2	132.47±41.9	0.2838 ^{NS}
ii)	Pulses	23.97±59.5	20.45± 12.6	0.1372 ^{NS}
iii)	Roots & tubers	45.38± 61.4	43.59±38.7	0.1969 ^{NS}
iv)	Other Vegetables	26.01±40.3	23.91±48.6	0.2187 ^{NS}
v)	Green leafy vegetables	2.0± 4.3	2.90±7.5	22.3783**
vi)	Fruits	14.58±24.7	12.05±17.3	3.2444**
vii)	Milk & Milk Products	129.03±99.7	119.06±95.3	0.6812 ^{NS}
viii)	Fats & Oils	16.54 ± 9.8	11.64 ± 6.5	1.8890 ^{NS}
ix)	Sugar & Jaggery	20.93 ± 5.3	18.54 ± 6.4	3.7448**

Values are mean ±SD.

**Significant at 1% level *Significant at 5% level NS= Non-significant.

Table : 3 Effect of size of family on food intake of pre-school children (3 to 5 years)

HARYANA STATE				
Sr. No.	Foodstuffs	Daily mean food intake (g)		
		Small Family (n=61)	Medium Family (n=208)	Large Family (n=31)
i)	Cereals ^{NS}	131.34±41.7	138.44±38.8	122.16±39.7
ii)	Pulses ^{NS}	17.53±71.2	25.37±11.4	16.77±12.1
iii)	Roots & tubers ^{NS}	37.49± 33.5	41.19±93.8	47.84±36.5
iv)	Other Vegetables ^{NS}	56.50±44.6	36.03±39.1	32.12±68.6
v)	Green leafy vegetables**	2.90±4.7	1.68±6.6	2.97±5.5
vi)	Fruits**	14.52±21.8	13.49±13.1	8.27±19.9
vii)	Milk & Milk Products ^{NS}	387.57±130.9	371.40±160.3	351.23±113.9
viii)	Fats & Oils ^{NS}	18.96 ± 9.6	18.12 ± 7.9	21.35 ± 10.1
ix)	Sugar & Jaggery ^{NS}	20.07 ± 6.5	23.85 ± 6.6	23.37 ± 7.7
MAHARASHTRA STATE				
		(n=88)	(n=187)	(n=25)
i)	Cereals ^{NS}	132.19±41.5	139.39±42.9	146.48±39.7
ii)	Pulses ^{NS}	20.68±10.3	28.56± 17.2	20.39± 17.3
iii)	Roots & tubers ^{NS}	35.78± 35.3	40.51±41.3	46.18±91.3
iv)	Other Vegetables ^{NS}	35.13±41.5	20.09±49.7	18.07±32.5
v)	Green leafy vegetables**	1.67± 6.4	2.69±4.8	2.99±6.3
vi)	Fruits**	15.71±20.4	13.57±24.9	8.87±18.7
vii)	Milk & Milk Products ^{NS}	129.14±103.6	120.34±121.6	107.41±137.6
viii)	Fats & Oils ^{NS}	13.39 ± 11.7	12.91 ± 8.5	12.15 ± 6.8
ix)	Sugar & Jaggery**	15.35 ± 9.5	18.08 ± 6.9	20.87 ± 6.4

Table 4 Effect of caste on food intake of pre-school children (3 to 5 years)

HARYANA STATE				
Sr. No.	Foodstuffs	Daily mean food intake (g)		
		Lower Caste (n=155)	Middle Caste (n=97)	Upper Caste (n=48)
i)	Cereals ^{NS}	143.14±45.2	137.03±37.2	124.36±36.4
ii)	Pulses ^{NS}	17.84±13.0	17.99±13.9	28.65±88.9
iii)	Roots & tubers ^{NS}	40.90± 35.6	42.50±34.4	44.29±107.4
iv)	Other Vegetables ^{NS}	37.36±56.7	53.47±27.9	21.46±48.2
v)	Green leafy vegetables**	1.64±6.2	2.65±6.2	2.99±3.1
vi)	Fruits ^{NS}	11.48±24.3	12.78±19.9	14.83±14.3
vii)	Milk & Milk Products ^{NS}	368.59±109.4	383.28±129.4	381.55±135.9
viii)	Fats & Oils**	15.51 ± 9.9	20.26 ± 8.6	20.49 ± 9.7
ix)	Sugar & Jaggery ^{NS}	23.98 ± 7.5	22.33 ± 6.1	23.65 ± 6.8
MAHARASHTRA STATE				
		(n=178)	(n=117)	(n=5)
i)	Cereals ^{NS}	161.32±37.9	156.17±43.6	143.06±36.3
ii)	Pulses ^{NS}	17.28±14.6	18.93±12.8	36.51±88.3
iii)	Roots & tubers ^{NS}	47.45±101.3	48.37±34.9	50.46±38.3
iv)	Other Vegetables ^{NS}	14.32±27.5	24.63±55.8	19.67±28.3
v)	Green leafy vegetables**	1.53±4.7	2.98±6.7	3.77±5.9
vi)	Fruits**	13.87±13.8	18.53±23.6	20.27±18.6
vii)	Milk & Milk Products ^{NS}	48.56±101.6	101.57±108.3	111.23±113.7
viii)	Fats & Oils ^{NS}	12.35±9.7	17.03±8.6	18.36±7.9
ix)	Sugar & Jaggery**	19.64±7.3	19.87±7.1	20.07±5.9

Values are mean ± SD.

**Significant at 1% level

NS = Non-significant.

Table 5 : Effect of mother's education on food intake of pre-school children (3 to 5 years)

HARYANA STATE						
Sr. No.	Foodstuffs	Daily mean food intake (g)				
		Illiterate (n=192)	Primary (n=53)	Middle (n=20)	Matric (n=31)	Graduate (n=4)
i)	Cereals ^{NS}	135.05±41.09	123.34±35.9	130.69±34.7	144.09±42.5	148.09±42.9
ii)	Pulses ^{NS}	21.68±8.3	20.93±12.1	21.98±14.2	22.65±62.6	23.68±62.3
iii)	Roots & tubers ^{NS}	36.32± 29.2	57.79± 28.4	56.29± 138.8	53.85±34.3	53.89±34.2
iv)	Other Vegetables ^{NS}	39.00±27.2	40.66±33.7	27.38±43.7	30.58±51.5	31.58±43.7
v)	Green leafy vegetables ^{**}	1.41±8.8	2.79±9.5	4.21±3.9	3.70±3.9	3.71±3.5
vi)	Fruits ^{NS}	9.64±26.2	10.17±45.3	38.67±10.2	19.31±11.7	20.37±10.3
vii)	Milk & Milk Products ^{NS}	371.91±115.8	362.45±123.6	452.43±133.8	353.74±124.8	363.73±133.6
viii)	Fats & Oils ^{NS}	17.73 ± 8.7	20.91 ± 8.9	23.36 ± 9.7	23.64 ± 9.3	23.66 ± 9.9
ix)	Sugar & Jaggery ^{NS}	23.77 ± 7.6	22.31 ± 5.1	24.67 ± 7.4	22.06 ± 6.9	22.07 ± 7.1
MAHARASHTRA STATE						
		(n=45)	(n=71)	(n=84)	(n=95)	(n=5)
i)	Cereals ^{NS}	147.07±41.7	148.67±36.8	150.32±36.8	162.05±43.8	163.36±37.8
ii)	Pulses ^{NS}	25.67±61.7	25.87±13.9	26.98±13.7	27.67±9.7	27.69±61.7
iii)	Roots & tubers ^{NS}	35.89± 29.7	58.27±102.7	56.67± 29.9	60.37±29.9	56.34±37.6
iv)	Other Vegetables ^{NS}	16.56±52.9	19.38±39.6	17.96±30.8	18.90±27.6	18.66±34.8
v)	Green leafy vegetables ^{**}	1.31±3.8	1.37±3.8	2.25±4.6	2.24±8.9	3.27±8.7
vi)	Fruits ^{**}	14.39±11.9	19.69±8.5	21.65±19.7	20.67±12.6	31.19±46.7
vii)	Milk & Milk Products ^{NS}	47.75±29.6	49.48±33.9	96.38±38.6	112.45±98.9	111.95±101.6
viii)	Fats & Oils ^{NS}	13.64 ± 9.0	14.63 ± 9.9	18.63± 7.9	19.79 ± 9.8	18.76 ± 9.6
ix)	Sugar & Jaggery [*]	19.76 ± 7.9	19.69 ± 7.6	21.26 ± 5.8	20.24 ± 9.4	21.76 ± 7.5

Values are mean ± SD.

****Significant at 1% level**

***Significant at 5% level NS = Non-significant**

Table 6 : Effect of mother's working status on food intake of pre-school children (3 to 5 years)

HARYANA STATE					
Sr. No.	Foodstuffs	Daily mean food intake (g)			
		Housewife (n=85)	Serving out in field (seasonal) (n=204)	Serving out in service (n=6)	Any other (n=5)
i)	Cereals ^{NS}	125.84±40.2	145.71±39.5	139.68±39	140.95±46
ii)	Pulses ^{NS}	22.87±14.2	19.83±66.5	23.99±19.8	21.65±17.6
iii)	Roots & tubers ^{NS}	43.90±87.1	41.47± 33.6	40.89± 80.5	41.36±14.3
iv)	Other Vegetables ^{NS}	35.11±57.0	41.69±39.4	42.88±41.5	40.94±50.1
v)	Green leafy vegetables**	2.49±5.5	2.24±4.8	2.19±5.6	2.48± 5.7
vi)	Fruits**	13.92±18.8	12.46±21.7	13.55±22.9	13.17±22.6
vii)	Milk & Milk Products ^{NS}	385.67±108.9	363.64±137.6	368.57±129.0	364.76±131.5
viii)	Fats & Oils ^{NS}	20.53 ± 9.9	17.08 ± 9.2	22.87 ± 8.5	20.92 ± 7.9
ix)	Sugar & Jaggery ^{NS}	22.06 ± 6.7	24.46 ± 6.8	20.14 ± 8.5	20.68 ± 8.4
MAHARASHTRA STATE					
		(n=125)	(n=167)	(n=6)	(n=2)
i)	Cereals ^{NS}	142.79±32.9	161.81±42.7	159.71±36.5	152.87± 86
ii)	Pulses ^{NS}	31.85±51.9	19.89±15.6	29.19±85.7	20.85±61.6
iii)	Roots & tubers ^{NS}	52.49± 32.6	49.98± 88.7	49.48± 33.5	47.98±86.4
iv)	Other Vegetables ^{NS}	22.65±33.4	22.17±58.3	21.91±13.5	18.89±15.6
v)	Green leafy vegetables**	3.26±6.9	2.87±6.5	2.27± 6.5	2.65± 7.9
vi)	Fruits**	20.97±21.9	16.42±19.8	20.64±22.9	15.43±19.6
vii)	Milk & Milk Products ^{NS}	110.67±101.5	59.63±69.8	68.79±61.5	70.53±79.2
viii)	Fats & Oils ^{NS}	17.03 ± 9.9	12.08 ± 9.6	16.58 ± 7.3	14.24 ± 6.3
ix)	Sugar & Jaggery*	20.49 ± 6.5	19.96 ± 7.5	18.08 ± 9.6	20.86 ± 13.5

Values are mean ± SD.

****Significant at 1% level**

***Significant at 5% level NS = Non-significant**

Table 7 : Effect of occupation of father on food intake of pre-school children (3 to 5 years)

HARYANA STATE							
Sr. No	Foodstuffs	Daily mean food intake (g)					
		Farming (n=46)	Service (n=19)	Business (n=27)	Labour (n=164)	Combination (n=42)	Caste Occupation (n=2)
i)	Cereals ^{NS}	126.70±35.4	117.88±32.4	118.34±43.3	152.92±41.0	140.83±38.6	150.97±40.5
ii)	Pulses ^{NS}	27.02±13.8	18.03±9.3	19.85±10.9	17.00±14.0	19.08±13.3	18.00±12.7
iii)	Roots & tubers ^{NS}	46.86± 27.6	66.00±19.5	33.95± 135.1	31.64±39.9	51.09±18.3	32.68±20.5
iv)	Other Vegetables ^{NS}	31.54±34.8	54.81±56.9	38.58±44.8	35.51±41.1	43.85±30.5	35.55±38.7
v)	Green leafy vegetables**	1.83±5.7	1.92±7.9	3.65± 6.1	2.52±3.1	2.96±7.5	2.59±4.9
vi)	Fruits**	15.21±6.4	15.18±26.1	14.67±24.5	8.87±24.9	12.16±23.7	10.82±21.9
vii)	Milk & Milk Products ^{NS}	395.00±123.7	351.91±150.0	378.40±128.7	350.82±121.9	365.94±128.7	369.80±121.1
viii)	Fats & Oils ^{NS}	20.30 ± 10.4	23.36 ± 7.2	17.84 ± 10.3	15.01 ± 7.9	20.38 ± 10.9	19.03 ± 11.5
ix)	Sugar & Jaggery ^{NS}	24.02 ± 6.5	20.85 ± 6.1	20.67 ± 7.5	23.33 ± 6.6	22.86 ± 7.3	24.30 ± 6.5
MAHARASHTRA STATE							
		(n=45)	(n=33)	(n=29)	(n=170)	(n=23)	(n=0)
i)	Cereals ^{NS}	168.97±51.9	120.76±46.5	125.87±36.5	178.89±38.5	152.86±34.5	0 (0)
ii)	Pulses ^{NS}	32.01±16.5	32.72±15.6	29.89±15.3	20.85±19.1	26.85±14.6	0 (0)
iii)	Roots & tubers ^{NS}	59.65±38.6	59.88±25.6	52.91± 16.7	35.58±32.6	39.96±26.5	0 (0)
iv)	Other Vegetables*	19.85±21.5	22.26±23.6	21.18±26.7	14.06±9.5	18.67±9.5	0 (0)
v)	Green leafy vegetables**	3.51±9.6	2.93±5.9	3.55± 9.7	4.65±5.5	1.65±6.5	0 (0)
vi)	Fruits**	17.85±25.6	21.25±26.9	20.81±27.5	12.66±19.9	14.88±26.6	0 (0)
vii)	Milk & Milk Products ^{NS}	119.88±119.6	111.07±126.5	112.03±122.9	61.63±41.5	59.63±38.8	0 (0)
viii)	Fats & Oils ^{NS}	22.39 ± 9.5	21.23 ± 8.5	20.83 ± 6.9	14.88 ± 12.6	15.30 ± 7.6	0 (0)
ix)	Sugar & Jaggery*	20.36 ± 9.5	18.02 ± 7.6	18.85 ± 6.5	20.67 ± 7.6	19.67 ± 7.5	0 (0)

Values are mean ± SD.

**Significant at 1% level

*Significant at 5% level NS = Non-significant

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