

## IMPACT OF THE MOTHER LITERACY, OCCUPATION AND SOCIOECONOMIC STATUS ON THE NUTRITIONAL STATUS OF THE CHILDREN.

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### Abstract :

#### Topic :

*Impact of mother literacy, occupation and socioeconomic status on the nutritional status of the children.*

#### Research Question :-

1. *What are the impact of mother's literacy on the nutrional status of the children.*
2. *To study the effect of mother's occupation and socio-economic status on the nutritional status of the children?*
3. *To suggest the various preventive measures to combat the nutritional problems.*

#### Material and Methods :-

- a) **Study Design** : A stratified multistage random sampling.
- b) **Setting** : A sample of two blocks namely, Jasra in trans Jamuna area and Saidabad in trans Gangs area.
- c) **Participants** : Children below 6 years of age.
- d) **Sample Size** : 436 children below 6 years of age.
- e) **Study Variables** : Literacy, occupation and socioeconomic status.
- f) **Statistical Analyses** : By proportions and Chi-square test.

#### Results :-

*The overall prevalence of malnutrition was found to be maximum in children of illiterate mother i.e 58.24 percent*

age are chronically malnourished.

#### Introduction :

Malnutrition stunts the mental and physical growth of one in three children in developing countries. One third of newborns start their life with low birth weight. More than half of young children below five years of age continue to suffer from moderate to severe malnutrition. Nearly 190 million children under five years of

During 1995 more than 28 percent of children of the world under the age of five years were underweight for their age i.e. 2.9 percent in the developed countries and 31 percent in the developing countries<sup>1</sup>. The problem is most widespread in South Asia. Majority of the malnourished children of the world are found in just three countries; namely, India, Pakistan and

Bangladesh.

India is the second most populous country of the world. Uttar Pradesh ranks first among the most populous states of India. The population of U.P is mainly rural, more than 70 percent people residing in villages. Mild, moderate and severe malnutrition are more common in eastern and central parts of U.P. The protein energy malnutrition in low birth weight children was 47 percent in rural and 50 percent in urban areas<sup>2</sup>. Institute of Applied Statistics & Development Studies (IASDS 1995) in U.P revealed that 52 percent children were underweight and 22.4 percent were severely underweight. Stunting was observed in 59.3 percent of the children while 36.2 percent suffered from severe stunting. 19.5 percent were found to be wasted and 5.1 percent were severely wasted<sup>3</sup>. 42% of the total population of U.P lives below poverty line. Every third child is born with weight below 2500 grams and 73 percent of the mothers are illiterate<sup>4</sup>.

Women and children constitute a large and vulnerable group or special risk group of the population. The risk is connected with childbearing in case of women and growth, development and survival in case of infants and children. The problems affecting the mother and child health are multifactorial. By improving the health of the mother and child, we contribute to the health of the general population.

This study has been done with the following aims and objectives:

1. To study the effect of mother's literacy on

the nutritional status of the children.

2. To study the effect of mother's occupation and socioeconomic status on the nutritional status of the children.
3. To suggest the various preventive measures to combat the nutritional problems.

### **Materials and Methods :**

The present study was conducted in the rural areas of Allahabad district during the year 2001-2002. A stratified multistage random sampling procedure was adopted to select study units. A sample of two blocks namely Jasra in trans Yamuna area and Saidabad in trans Ganga area were selected randomly as primary stage units. Within selected primary stage units a sample of villages were selected as secondary stage units. Within selected villages, children below six years of age were surveyed as ultimate study subjects.

Optimal sample size was calculated on the basis of pilot survey results wherein about 40.0 percent children under the age of six years were found to be malnourished in the community surveyed. Based on this, sample size with an acceptable error of 5 percent level of significance was obtained to be 436 children. The anthropometric measurements like weight, height and mid-arm circumference were taken for assessing the nutritional status of children. Enquiry regarding literacy status, occupation, and socioeconomic status of mother were also done. All the information was recorded on a predesigned and pretested proforma and

statistical analysis was done by proportions and tests of significance.

**Results :**

The overall prevalence of malnutrition was found to be maximum in children of illiterate mothers i.e.58.24 percent, 28.0 percent in children whose mothers were educated up to primary school and only 2.86 percent in children whose mothers were educated up to high school level. None of the malnourished children were found in the mothers educated up to intermediated and above. Malnutrition was significantly associated with literacy status of the mother [ $\chi^2 = 64.41, d.f=1; p<0.001$ ].

The overall prevalence of malnutrition was

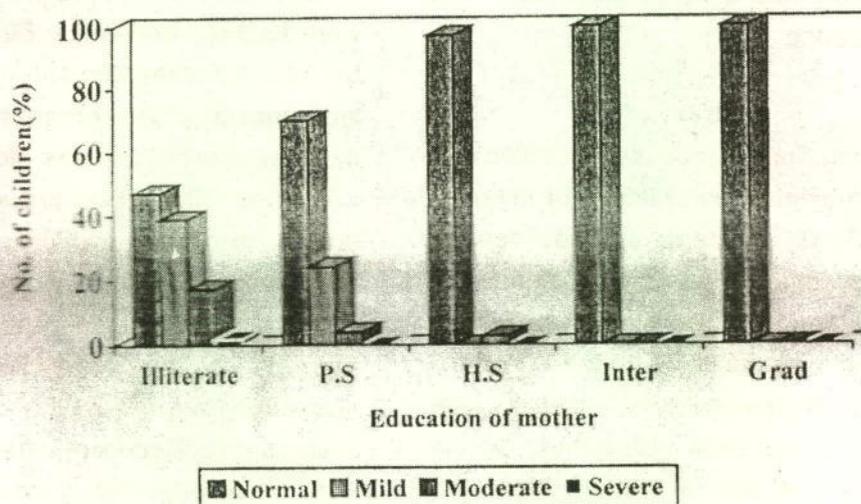
found to be maximum in children whose mothers were domestic workers i.e. 60.01percent, followed by 56.20 percent in children of agricultural labourers and 34.1 percent in children whose mothers were housewives. No malnourished child was found with mothers in service. [ $\chi^2= 21.89; p< 0.001$ ]. In other words, maximum number of malnourished children were found in working mothers (56.70 percent) and less in nonworking mothers (34.14 percent). This difference is statistically significant [ $\chi^2 = 15.99, d.f=1; p<0.05$ ]. In terms of socioeconomic status, malnutrition was very much high in low socioeconomic status mothers (69%) in comparison to middle (25%) and high (6%). These differences were also found to be statistically significant [ $\chi^2 = 19.22, d.f=2; p<0.001$ ].

**TABLE - 1**

**Nutritional grades [weight for age criteria] of the children by education of the mother.**

Grading of Malnutrition	Education of the mother					Total
	Illiterate	Primary School	High School	Intermediate	Graduate	
	No. (%)	No.(%)	No.(%)	No.(%)	No.(%)	No.(%)
Normal	147 (41.76)	18 (70.00)	34 (97.14)	20 (100)	4 (100)	223 (51.15)
Mild	137 (38.92)	6 (24.00)	0	0	0	143 (32.80)
Moderate	61 (17.33)	1 (4.0)	1 (2.86)	0	0	63 (14.45)
Severe	7 (1.99)	0	0	0	0	7 (1.61)
Total	352 (80.73)	25 (5.73)	35 (8.03)	20 (4.59)	4 (0.92)	436 (100)

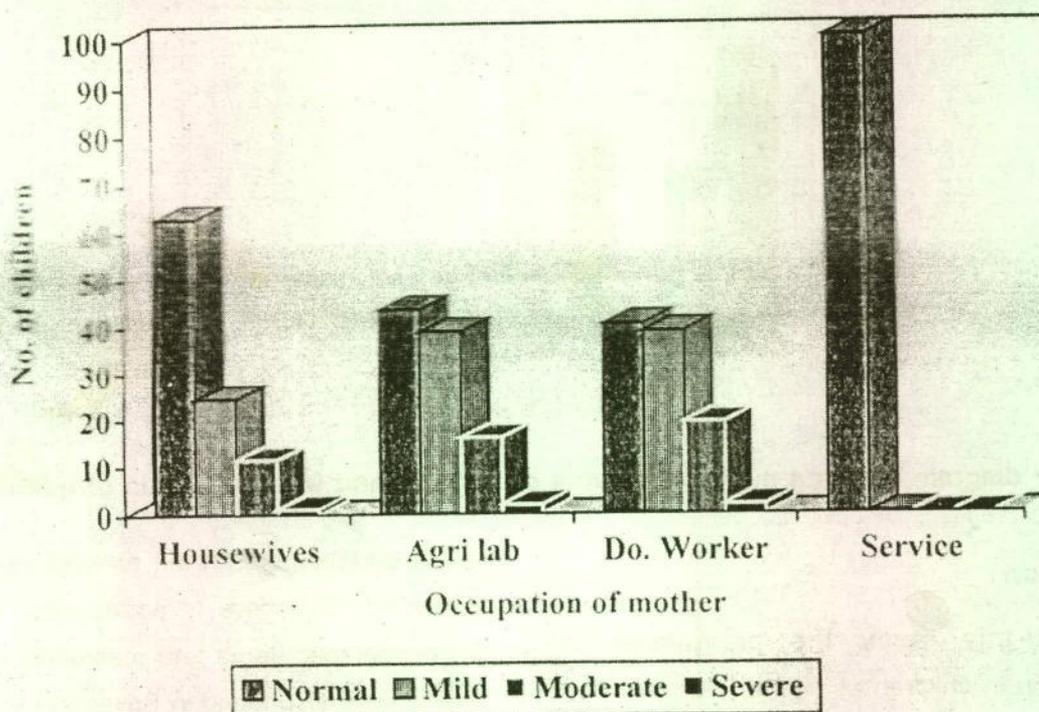
[ $\chi^2 = 64.41, d.f=1; p<0.001$ ]



Bar diagram showing nutritional status of children and education of mothers

**TABLE - 2**  
Nutritional grades [weight for age criteria] of the children by occupation of the mother.

Grading of malnutrition	Occupation of the mother				Total
	House wives	Agricultural Labourer	Domestic Workers	Service	
	No.(%)	No.(%)	No.(%)	No.(%)	
Normal	110 (62.85)	90 (43.48)	21 (40.38)	2 (100)	223 (51.15)
Mild	43 (24.57)	80 (38.65)	20 (38.86)	0	138 (32.80)
Moderate	20 (11.43)	33 (15.94)	10 (19.23)	0	63 (14.45)
Severe	2 (1.14)	4 (1.93)	1 (1.92)	0	7 (1.61)
Total	175 (40.14)	207 (47.48)	52 (11.93)	2 (0.46)	436 (100)



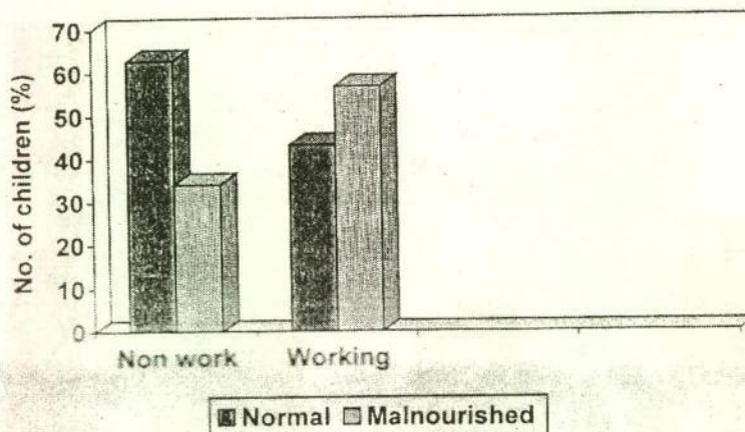
Bar diagram showing nutritional status of children and occupation of mothers

TABLE - 3

Nutritional grades [weight for age criteria] of the children by socioeconomic status

Socioeconomic status	Nutritional status		Total (100%) No. (%)
	Normal (73%) No. (%)	Malnourished (27%) No. (%)	
	Low	147 (46)	81 (69)
Middle	127 (40)	29 (25)	156 (36)
High	45 (14)	7 (6)	52 (12)
Total	319 (100)	117 (100)	436 (100)

$[\chi^2 = 19.22, d.f=2; p<0.001].$



Bar diagram showing nutritional status of children and working status of mothers

### Discussion :

In this study the prevalence of malnutrition in children of illiterate mothers was 58.24 percent in comparison with the study of Institute of Applied Statistics & Development Studies (IASDS) in Uttar Pradesh 1995, which found that 56 percent of malnourished children were of illiterate mothers<sup>3</sup>. Similar study in the rural areas of Allahabad showed 62.98 percent malnutrition among children of illiterate mothers<sup>5</sup>. Similar results were found in the studies of Deoki Nandan (1979)<sup>6</sup>, Srivastav. V.K (1983)<sup>7</sup> and Saxena.S.C (2003)<sup>8</sup>. Children of mothers who were housewives were less malnourished than the children whose mothers were either domestic workers or agricultural labourers. Comparable with the study of Institute of Nutrition & Food Hygiene, Chinese Academy of preventive medicine, Beijing, China (1999)<sup>9</sup>. Children of non-working mothers were better nourished than the children whose mothers were agricultural or self-

employed labourers. In the present study it was observed that there is association between socioeconomic status and malnutrition. Similar findings were also found in Srivastava V.K<sup>7</sup>.

### Conclusion :

Literacy among mothers has significant impact on the nutritional status of their children. Educated mothers are able to provide proper childcare, understand nutritional aspects better than uneducated counterparts. They can also plan home economics thereby providing nutritious food at low cost. It results in better nutritional of their children.

Various occupations and socioeconomic status of the mother influence nutritional status of children in different ways. Mothers working in administrative, technical and other professional units have a higher yearly income and education level compared to agricultural labourers and domestic workers. Obviously it leads to adequate

nutrition and less malnourishment among their children. Housewives even if their per capita income is less are able to spend enough time for childcare and preparation of food, which is lacking in labourers. Literacy among housewives will be an added advantage as mentioned above. so their children are less malnourished than children of mothers who are labourers.

**Recommendations :**

The following steps must be taken for the betterment of nutrition in children:

1. Implementation of free and compulsory school education up to the age of 14 years through Sarva Shiksha Abhiyan placing more importance on girls' education.
2. Implementation of Government policy for more opportunities and reservation for women in various administrative, technical and other professional units thereby improving their economic status and standard of living of their families.
3. Health and nutrition education and teaching home economics to school children especially girls.

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