Nutritional status of Under Five Years children of Falluga refugees

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Abstract

In 2005 Falluga city had an humanitarian crisis situation, characterized by armed conflict. Larg population displaced. To assess the nutritional status of under five children, a check of 678 child in five places of Internal Displaced Peoples . was achieved

The results indicated that 19.6%, 48.5% of the children had diarrhea and acute respiratory infection. Twenty percent of the children had achronic malnutrition while 4.1% & 0.5% had a general and acute malnutrition.

Introduction

Malnutrition was the direct or underlying cause of deaths of 49% of children under 5 years in developing countries during 1995 (1) Growth faltering and malnutrition usually start at around the age of 6 months, mainly because the complementary feeding either began later was not done properly (2).

In recent years, humanitarian crisis situation have been characterized by political instability, armed confilects, larg population displacements, food shortages, social disruption and collapes of the public health infrastructure (3) And have resulted in increases in mortality about the usual levels due to a combination of disease malnutrition and aggression (4) In such situations they are often referred to as emergencies or crises (5).

Falluga is a large district based on about 60 km on North West of Baghdad, It was affected by armed confilict which led to the displacement of most of its population.
Assessment of nutritional status of under five children of Falluga refugees, the source of water and food supplies and the percentage of malnutrition are the aim of this study.

A representative random sample of U5 children in 5 locations (Al-Habbania, Al-Saqlawia, Al-Qarma, Aameriat al falluga and Baghdad camps).

Methods

A random sample of 687 U5 children was selected in 2005, Subjects were selected from different geographical areas of Internal Displaced Peoples (IDPs) by using a probability proportional to size sampling methods.

Anthropometric measures of children were done to determine the prevalence of malnutrition, the weight of the children was measured by using uniscale and height by using a height wooding board, The precision of the scales was checked with control weight. The percentage prevalence of under weight (weight- for–age), wasting (weight–for–height) and stunting (height–for–age) were calculated The reference for anthropometric measures was the world Health Organization National Center for Health Statistics (WHO/NCHS) standards (7) and the cut–offs were -2 standard deviations from the mean.

Results

The results show that :

1. Sex distribution

There was 371 male of the children and 316 female with 54% and 46% respectively.

2. Age distribution

Table (1) show the age distribution of the children, those who are in the first and second year of life contributed to about 42.8. Those whose age 4-5 years contributed only 17.6.

3. Nutritional status by total sample

General malnutrition (under weight – for – age) in the total sample occur in about (4.1%) of children under five years of age, chronic malnutrition (low height–for- age) occurs in (20%) and acute malnutrition (low weight-for- height) in about 0.5%, The nutritional problem remains serious for chronic malnutrition.

Direct comparisons of the survey with those based on house holds must be cautions. Even so the present underweight estimation of 4.1% is about a quarter the of Iraq (15.7%), the less than quarter of Anbar governorate (18.7%) and about half of Turkey (9-10%) (8), While the present chronic malnutrition estimation of 20% is less than in whole Iraq & Anbar (25.9%, 24.1%) respectively (9).

4. Malnutrition by age

The pattern of malnutrition by age shows the critical age at risk of those who are under two years, Level of chronic malnutrition for children aged 1-2 years are greater (25%) than those aged less than one year And those who are more than two years, are also relatively at a high rate for young Infant and older children.

The prevalence of a general malnutrition is low (7.3%) for children aged 1-2 years and below that for young infants and older children, While for acute malnutrition the high prevalence is found in children aged 4-5 years (1.6%).

Table (2) shows that.

5. Malnutrition by sex

There is some different in malnutrition rates for males & females. The prevalence is higher in male than female. Table (3) shows that.

6. Prevalence of malnutrition by Sex and Age

Table (4) shows the prevalence of malnutrition for the children who depends on their sex and age, which indicates that the chronic malnutrition was high in all age, sex groups while the acute malnutrition ranged between 0-1.6% and the general malnutrition rang 2-7.3%.

7. Social & Health Indicators

A-Family Work

The results show that 61.3% of the fathers of the children had free work, while 95.2% of the mothers were housekeeper (Table 5) indicate the distribution of the sample according to the work of the fathers & the mothers of the children.

B-Morbidity Diarrhea & Acute Respiratory Infection (ARI)

The results show that 19.6% of the children had diarrhea at the last week of the research while a high percentage of the children had ARI 48.5. Table (6) shows the prevalence of morbidity.

C- Source of food

About 55% of the families depended on the food ration which was distributed by the Ministry of Trade, While 38.4 bought their food from the local market and only 6.3% depended on food aids. Table (7) shows that.

D- Source of waters

The results indicate that 68.2% of the families got their water supply from the tab water, 18.5% direct from the river, 6.6% from wells & 6.2% from tankers. Table (8) shows that.

Discussion

According to the results of the research the following findings were:

1. The percentage of chronic malnutrition was about 20%, this result is the same as in the other parts of Iraq especially in the South-Center districts.
2. The prevalence of general and acute malnutrition 4.1%, 0.5 respectively which were much less than the other parts of Iraq, or the national figures 15.9% & 6.7.
3. 19.6 & of children had diarrhea & 48.5 had ARI which were very high and indicate the bad living situation.
4. About 30% of children used unsafe water.

So, inorder to solve the nutritional problems of the (IDPs) in Falluga and other Places:

It should provide safe water to all IDPs, health facilities should be available to all children as prevention & treatment, follow up the nutritional status of all IDPs in different governorates, educate mothers & families to use safe food & water supply.

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Table (1): sample age distribution by year

Age / year	%
0-1	22.7
1-2	19.8
2-3	20.1
3-4	19.8
4-5	17.6

Table (2): Prevalence of malnutrition by age

Age / year	General malnutrition -2SD W/A	Chronic -2SD H/A	Acute -2SD W/H
0-1	4.7	16.3	0.5
1-2	7.3	25	0.1
2-3	4.3	15.2	0.7
3-4	2.9	22.8	0.0
4-5	4.9	20.7	1.6

Table (3): Prevalence of malnutrition by sex

Sex	General -2SD W/A	Chronic -2SD H/A	Acute -2SD W/H
Male	4.3	22.7	0.8
Female	3.8	17.5	0.3

Table (4): Prevalence of malnutrition by sex and age

Age/month	Sex	W/A -2SD	H/A -2SD	W/H -2SD
0-5.9	Male	2	22.4	2
	Female	2.4	14.7	-
	Total	2.2	18.9	1.1
6-11.9	Male	7.1	16.7	-
	Female	-	8.3	-
	Total	3.5	12.5	-
12-7.9	Male	3	24.3	-
	Female	11.4	22.9	-
	Total	7.3	23.6	-
18-23.9	Male	5.2	26.2	-
	Female	-	26.6	-
	Total	3	26.4	-
24-35.9	Male	8.7	18.8	1.4
	Female	-	11.5	-
	Total	4.3	15.2	0.7
36-47.9	Male	-	22.0	-
	Female	5.9	23.8	-
	Total	2.9	22.9	-
48-60	Male	4.2	23.6	1.4
	Female	6.1	16.3	2
	Total	4.9	20.7	1.6

Table (5): Percentage of fathers and mothers work

Work	Father	Mother
Government employee	16.6	3.8
Retired	4.4	0.1
Free work	61.3	0.6
Workless	12.5	-
Unable to work	1.5	-
House keeper	-	95.2
Others	3.8	0.3

Table (6): Prevalence of morbidity

Illness	Yes%	No%
Diarrhea	19.6	80.4
ARI	48.5	51.5

Table (7) : Food source

Source of foods	%
Food ration	55.1
Food aids	6.3
Local aids	38.4
Others	0.1

Table (8): Water source

Source of water	%
Tab water	68.2
River	18.5
walls	6.6
Tankers	6.2
Others	0.4

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الحالة التغذوية للأطفال دون الخامسة من العمر لمهجري الفلوجة

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الخلاصة

في عام 2005 تعرضت مدينة الفلوجة الى حملة عسكرية ادت الى تهجير العوائل منها الى مناطق متعددة. وبهدف تقييم الحالة التغذوية للاطفال دون الخامسة من العمر تم فحص 687 طفلاً في خمس مناطق تجمع، واظهرت النتائج ان نسبة 19.6% من الاطفال كانوا يعانون من الاسهال و48.5% أصيبوا بالالتهابات التنفسية الحادة. وكانت نسبة الاطفال الذين يعانون من سوء التغذية المزمن (نقص الطول الى العمر) 20% أما الأطفال الذين يعانون من سوء التغذية العام (نقص الوزن الى العمر) فكان 4.1% وسوء التغذية الحاد (نقص الوزن الى الطول) 0.5%.