





## Article

# Correlates of Sub-Optimal Feeding Practices among Under-5 Children amid Escalating Crises in Lebanon: A Representative Cross-Sectional Study

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**Abstract:** Sub-optimal feeding practices among under-5 children are a global public health problem. This study aims to assess the prevalence of malnutrition (wasting, stunting, overweight, and obese) and feeding practices (exclusive breastfeeding, bottle feeding, and complementary feeding practices) among under-5 children amid the COVID-19 pandemic as well as the economic and the political crises in Lebanon. A representative stratified random sample of mother–child dyads was selected from 10 households using a stratified cluster sampling design. The survey included information on complementary feeding practices using a valid questionnaire. Data on the mother and child were collected. Multivariate logistic regression analysis identified determinants associated with under-5 children's feeding practices. The prevalence of wasting, overweight and obese children was 0.5%, 8.4%, 6.7%, 1.1% among under-5 children, the prevalence of exclusive breastfeeding was 41.2%.

**[Correlates of sub-optimal feeding practices among under-5 children amid escalating crises in Lebanon: A national representative cross-sectional study](#)**

Publication date: 2022

Sub-optimal feeding practices among under-5 children are the major drivers of malnutrition. This study aims to assess the prevalence of malnutrition and the factors affecting exclusive breastfeeding, bottle feeding, and complementary feeding practices among under 5 children amid the COVID-19 pandemic as well as the economic and the political crises in Lebanon. To conclude, this study demonstrated non-negligible rates of malnutrition, low prevalence of exclusive breastfeeding, and high rates of early introduction of formula feeding and solid foods among Lebanese under 5 children amid escalating crises.

[English](#)

Call to action to address  
**Maternal and child  
undernutrition in the Middle  
East and North Africa, Eastern  
Mediterranean and Arab  
regions**

With a focus on Afghanistan, Djibouti, Lebanon, Pakistan, Somalia, Sudan, Syrian Arab Republic and Yemen

**[Call to action to address maternal and child undernutrition in the Middle East and North Africa, Eastern Mediterranean and Arab regions with a focus on Afghanistan, Djibouti, Lebanon, Pakistan, Somalia, Sudan, Syrian Arab Republic and Yemen](#)**

Publication date: 2022

Malnutrition in all its forms takes a heavy toll on the health, well-being and sustainable development of countries in the Middle East and North Africa, Eastern Mediterranean and Arab regions. Infants, young children, pregnant women and breastfeeding mothers, in particular, face significant risks to their nutritional status and well-being in contexts where access to essential health and nutrition services and affordable healthy diets is constrained. This call to action highlights some immediate priority areas to address the high undernutrition in the context of the current food security situation, the ongoing pandemic and the multiple crisis or post-crisis situations in the regions.

[English](#)



# Households' Food Insecurity and Their Association With Dietary Intakes, Nutrition-Related Knowledge, Attitudes and Practices Among Under-five Children in the Gaza Strip, Palestine

Abdel Hamid El Bilbeisi<sup>1\*</sup>, Ayoub Al-Jawaldeh<sup>2</sup>, Ali Albelbeisi<sup>3</sup>, Ibrahim Elmadfa<sup>5</sup> and Lara Nasreddine<sup>6</sup>

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The present study aimed to determine the household food insecurity and its association with dietary intakes, nutrition-related knowledge, attitudes and practices (KAP) among under-five children in the Gaza Strip, Palestine. The study was conducted in 2021 among a representative sample of households. A total of 350 children and their proxy were selected from 70 households using a cluster random sampling method. The Radington Food Insecurity Scale was used. A 24-h dietary recall was employed for assessing dietary intakes. Nutrition-related KAP for feeding under-five children, a

**Households' food insecurity and their association with dietary intakes, nutrition-related knowledge, attitudes and practices among under-five children in Gaza strip, Palestine**

Publication date: 2022

The study aimed to determine the households' food insecurity and their association with dietary intakes, nutrition-related knowledge, attitudes and practices (KAP) among under-five children in the Gaza Strip, Palestine. To conclude, the children from food-insecure households had a high prevalence of moderate underweight, stunting, wasting, and acute undernutrition. Moreover, low economic status, poor dietary intake, low levels of nutrition-related KAP, and lack of dietary diversity could contribute to the high levels of food insecurity among under-five children.

[English](#)

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# The Analysis of Trends in Stunting, Wasting and Underweight in the Eastern Mediterranean Region: More Effort Needed to Achieve the Sustainable Development Target 3.6

Bahareh Nikooyeh,  
Maryam Amini, PhD<sup>1</sup> Hamid  
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**[The analysis of trends of preschool child stunting, wasting and overweight in the Eastern Mediterranean Region: still more effort needed to reach global targets 2025](#)**

Publication date: 2022

This study was undertaken to analyze and compare the progress made by countries in the Eastern Mediterranean Region (EMR) countries in achieving the WHO nutrition global targets for children's growth indicators by 2025. Despite descending trends of child stunting and wasting and a secular trend of child obesity in EMR, it is expected that WHO targets will not be achieved by 2025. A diverse socio-economic condition in EMR countries necessitates different action plans. International determination, political commitment and, above all, involvement of the families are needed to achieve 2025 targets for child stunting, wasting and overweight/obesity.

[English](#)



## *toxins*

*Article*

# Aflatoxin B1 Occurrence in C Food Products and Aflatoxin Characterization of Arab Inf Infant Powdered Formula: A

Rouaa Daou <sup>1,†</sup> , Maha Hoteit <sup>2,3,4,\*,†</sup> , Khlood B  
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**[Aflatoxin b1 occurrence in children under the age of five's food products and aflatoxin m1 exposure assessment and risk characterization of Arab infants through consumption of infant powdered formula: a Lebanese experience](#)**

Publication date: 2022

The carcinogenic potency of Aflatoxin B1 (AFB1) and Aflatoxin M1 (AFM1) was severely reported. The aims of this study were (1) to survey the contamination level of AFM1 in the most traded infant powdered formula brands along with the AFB1 level in under-5 children's food brands and (2) to assess the estimated daily intake (EDI), the hazard quotient (HQ) and the margin of exposure (MOE) of AFM1 among infants (0–12 months) in Lebanon. The findings show that AFM1's EDI, HQ and MOE scored high among Lebanese infants.

[English](#)






*nutrients*

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*Review*

# Review of the Nutrition Situation in Jordan Way Forward

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## [Review of the nutrition situation in Jordan: Trends and way forward](#)

Publication date: 2022

Jordan is witnessing an escalating pace of nutrition transition, which may be associated with an increased burden of malnutrition and related non-communicable diseases. This review analyzes the nutrition situation in Jordan by exploring specific nutrition indicators, namely infant and young child feeding, low birthweight, micronutrient deficiencies, anthropometric indicators, and food consumption patterns. Results showed that although most children were ever breastfed and early initiation of breastfeeding had a two-fold increasing trend, rates of exclusive breastfeeding below 6 months of age and continued breastfeeding until two years of age were low. Complementary feeding indicators, particularly minimum diet diversity and minimum acceptable diet standards, were suboptimal.

[English](#)



*children*

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*Article*

# **Nutrition Assessment of Un Tracking the Achievement o**

**Mohamed Abu-Manga <sup>1</sup>, Ayoub Al-Jawaldeh <sup>2</sup>, Ab  
and Fekri Dureab <sup>5,6,\*</sup>**

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## [Nutrition assessment of under-five children in Sudan: tracking the achievement of the Global Nutrition Targets](#)

Publication date: 2021

Malnutrition places a heavy burden on the health, well-being and sustainable development of populations in Sudan, especially a country affected by conflict, which continues to experience high levels of food insecurity, undernutrition, and micronutrient deficiencies. This study aims to describe the nutritional status of children under five years old and identify the progress toward the achievement of the Global Nutrition Targets. Despite the welcome commitments by the Government and all stakeholders, Sudan is still struggling to implement strategies, policies and regulatory measures to address malnutrition and achieve the Global Nutrition Targets in 2025 and the Sustainable Developmental Goals in 2030. Therefore, more than ever, there is a need for comprehensive, multi-sectoral action to address malnutrition in all its forms.

[English](#)










*children*

*Review*

# Tackling Childhood Stunting in the Eastern Mediterranean Region

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Received: 25 September 2020; Accepted: 13 November 2020

## [Tackling childhood stunting in the Eastern Mediterranean Region in the context of COVID-19](#)

Publication date: 2020


Over 20 million children under 5 years old in the WHO Eastern Mediterranean Region have stunted growth, as a result of chronic malnutrition, with damaging long-term consequences for individuals and societies. This review presents an up-to-date picture of child stunting in countries of the Region. It examines the regional trend in stunting over recent decades, summarizes the situation in the countries, and examines the association between stunting prevalence and levels of income and human development. It also summarizes data on the implementation of a multisectoral approach to tackling malnutrition in the Region.

[English](#)



Article

# An Overview on Acute Malnutrition and Food Insecurity among Children during the Conflict in Yemen

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**Abstract:** Background: This study aims to describe malnutrition among children in Yemen to describe the food insecurity status during the current conflict in Yemen. Data were obtained from a Yemeni nutrition surveillance program (pilot phase) targeting 5276 children under five from two governorates (Ibb and Sana'a). Results: Global Acute Malnutrition (GAM) was found in 13.3% of overall screened children, while 4.9% had severe acute malnutrition (SAM) and 8.4% had moderate acute malnutrition. One-fifth of the children under five were acutely malnourished, followed by children under two years at 18.5% based on Z-scores. Significant associations between malnutrition and other diseases including pneumonia were found at three times higher rates (4.5%,  $p < 0.00$ ) among SAM cases than other children. Cough were significantly higher among the SAM group ( $p < 0.05$ ). Most households did not buy market food purchases in the month preceding this survey (84.7%). Households struggling to secure daily meals included borrowing food to survive, changing types of food, and decreasing the number of meals per day; some families sent their children to work. Conclusion: Malnutrition is a serious public health problem. The humanitarian organizations should adopt alternative strategies to improve food security and the nutrition status.

**Keywords:** malnutrition; food insecurity; infection; Yemen

## [An overview on acute malnutrition and food insecurity among children during the conflict in Yemen](#)

Publication date: 2019

This study aimed to describe malnutrition among children under five and to describe the food insecurity status during the current conflict in Yemen. Data were obtained from a Yemeni nutrition surveillance program (pilot phase) targeting 4142 households with 5276 children under five from two governorates (Ibb and Sana'a). Global acute malnutrition was found in 13.3% of overall screened children, while 4.9% had severe acute malnutrition and 8.4% had moderate acute malnutrition. One-fifth of the children under six months of age were acutely malnourished, followed by children under two years at 18.5%. Significant associations between malnutrition and other diseases were observed.

[English](#)

Menu

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## Field Exchange

# Building capacity in inpatient treatment of acute malnutrition in Yemen

By Fekri Dureab, Dr Ayoub Al Jawaldeh and Dr Latifah Abbas

*Fekri Dureab MD was the head of the nutrition department at WHO Yemen office until 2013. He is currently a PhD Student at Heidelberg University, Germany.*

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*The authors would like to express their gratitude to all staff of the Therapeutic Feeding Teaching Hospital in Aden, as well as the World Health Organization Yemen office, for their support to carry out this project in Yemen.*

**Location:** Yemen

**What we know:** Complicated cases of severe acute malnutrition (SAM) have a high mortality rate and require competent inpatient care.

**What this article adds:** WHO conducted a study to explore the impact of a program of technical and systems support on the inpatient care of malnourished children in Al-Sada Governorate, Yemen from 2010 to 2013. Support included six-day training courses, refresher training of hospital physicians as trainers, continuous on-the-job training for all hospital health workers, awareness-raising of non-clinical staff, and monitoring of therapeutic food and medicine supplies and staff incentives were resolved. Outcomes were expanded with UNICEF and WFP support in 2013. Inpatient mortality rate decreased (from 15.4% in 2010 to 4.5% in 2013) and recovery improved, but the defaulter rate increased (from 15.4% in 2010 to 20.4% in 2013) due to challenges in accessing the service. One quarter of admissions were

## [Building capacity in inpatient treatment of severe acute malnutrition in Yemen](#)

Publication date: 2018

Complicated cases of severe acute malnutrition have a high mortality risk and require competent inpatient care. This study aims to explore the impact of a programme of in-service training and systems support on the inpatient care of malnourished children in Al-Sadakah Hospital, Aden Governorate, Yemen from 2010 to 2013. The findings show that community participation and access to community services have an important impact on health.

[English](#)

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