Pregnant mothers' lifestyle factors based on their past or present illnesses

Rehab Flieh Hassan^{1*}, Muna Abdulwahab Khaleel²

¹University of Babylon, College of Nursing, Iraq

AUTHORS' CONTRIBUTION: (A) Study Design · (B) Data Collection. (C) Statistical Analysis · (D) Data Interpretation · (E) Manuscript Preparation · (F) Literature Search · (G) Funds Collection

This study examines how maternal lifestyle factors affect maternal health conditions and fetal development among women with past or present illnesses. A quantitative, cross-sectional design was used to collect data from 250 pregnant women aged 20 and above in two governmental hospitals in Hilla City, Iraq, from December 2023 to June 2024. The study evaluated demographic characteristics, lifestyle habits, and the prevalence of diabetes mellitus and hypertension. Results showed that 91.3% of participants maintained satisfactory lifestyle behaviors, though gaps in understanding and practicing wellness strategies were evident. High rates of chronic illnesses, such as diabetes (38.1%) and hypertension (29.4%), highlighted the need for targeted interventions. Women with chronic illnesses and multiple pregnancies exhibited improved lifestyle practices, but stress and fatigue remained barriers. The findings underscore the importance of primary healthcare facilities in promoting healthy lifestyles in underserved areas. Recommendations include enhanced health education, specialized care units for chronic conditions, community support networks, and technological solutions for maternal health monitoring.

Keywords: Pregnant mothers; Lifestyle factors; Past or present illnesses

Address for correspondence:

Dr. Rehab Flieh Hassan, University of Babylon, College of Nursing, Iraq

Word count: 741 Tables: 03 Figures: 01 References: 05

Received: 25.01.2025, Manuscript No. gpmp-25-161793; **Editor assigned:** 27.01.2025, PreQC No. P-161793; **Reviewed:** 11.02.2025, QC No. Q-161793; **Revised:** 28.02.2025, Manuscript No. R-161793; **Published:** 31.03.2025

INTRODUCTION

A mother's health during pregnancy significantly influences her child's development. Perinatal programming, where external factors impact pregnancy and future health, emphasizes the importance of a healthy lifestyle. Maternal weight gain, exercise, and smoking are critical factors affecting pregnancy outcomes [1]. Unhealthy lifestyles can lead to gestational diabetes, preterm labor, and other complications. Lifestyle choices, including diet, physical activity, and stress management, play a vital role in maternal and fetal health. This study explores the impact of lifestyle factors on pregnant women with past or present illnesses, focusing on their health behaviors and pregnancy outcomes [2,3].

METHODOLOGY

Study design: A quantitative, cross-sectional study was conducted from December 10, 2023, to June 10, 2024, in two governmental hospitals in Hilla City, Iraq.

Ethical approval: Approval was obtained from the Babylon Health Directorate and the participating hospitals. Oral consent was acquired from all participants, ensuring confidentiality and voluntary participation.

Setting: The study was conducted in Babylon Teaching Hospital for Maternity and Children and AL-Imam AL-Sadiq Teaching Hospital.

Population and sampling: A convenience sample of 250 pregnant women aged 20 and above was selected using purposive sampling. Participants were divided between the two hospitals, with 150 from AL-Imam AL-Sadig and 100 from Babylon Teaching Hospital.

Instrumentation: A questionnaire was designed to collect demographic data, history of illnesses, and lifestyle factors. The questionnaire included three parts: demographic information, history of past or present illnesses, and lifestyle factors.

Statistical analysis

Data were analyzed using IBM SPSS version 26. Descriptive and inferential statistics were used, with a significance level of p<0.05.

RESULTS

The majority of participants were aged 20-24 (28.2%), with 34.9% having intermediate education. Most were government employees (36.5%) or housewives (34.1%). Nearly half (48.8%) reported their economic status as "barely sufficient," and 70.2% lived in urban areas (Tab. 1.).

²Professor, University of Babylon, College of Nursing, Iraq

Diabetes mellitus (38.1%) and hypertension (29.4%) were the most common conditions. Multiple pregnancies were reported by 7.9% of participants (Fig. 1.).

91.3% of participants had a fair level of lifestyle factors. Nutrition was rated as good by 44.8%, while stress levels were mild for 62.7% (**Tab. 2.**).

Significant differences were found in lifestyle factors for women with diabetes, hypertension, and multiple pregnancies (p<0.05). No significant differences were observed for psychiatric illnesses or genetic abnormalities (Tab. 3.).

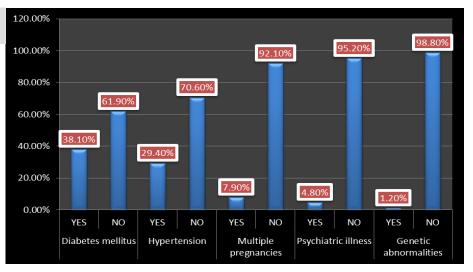
DISCUSSION

The study revealed that most pregnant women maintained average lifestyle practices, though gaps in knowledge and implementation were evident. Chronic conditions like diabetes and hypertension were prevalent, necessitating targeted interventions [4]. Women with multiple pregnancies and chronic illnesses showed improved lifestyle practices but faced challenges such as stress and fatigue. Primary healthcare centers were identified as crucial for promoting healthy lifestyles, especially in low-resource settings [5].

Tab. 1. Socio-demographic data and personal characteristics.

Variables		Frequency	Percent
	Less than 20	22	8.70
Mothers Age	20-24	71	28.20
	25-29	39	15.50
	30-34	64	25.40
	35-39	41	16.30
	40 or above	15	6.0
	Total	252	100.0
	Not read and write	18	7.1
	Read and write	21	8.3
Mothers Educational Level	Primary school graduate	9	3.6
	Intermediate school graduate	88	34.9
	High school graduate	56	22.2
	Institute and above	60	23.8
	Total	252	100.0
	Governmental employee	92	36.5
Occupation	Private job	38	15.1
	House wife	86	34.1
	Student	36	14.3
	Total	252	100.0
	Sufficient	114	45.2
Family Economic Status	Barely Sufficient	123	48.8
	In sufficient	15	6.0
	Total	252	100.0
	Urban	177	70.2
Residence	Rural	75	29.8
	Total	252	100.0
Family Type	Nuclear	82	32.5
	Extended	82	32.5
	Others	88	34.9
	Total	252	100.0

Fig. 1. Distribution of past or present illnesses.



Tab. 2. Distribution of lifestyle factors.

Variables	Variables		Frequency	Percent
		Poor	11	4.4
	Occupation	Fair	166	65.9
		Good	75	29.8
		Total	252	100.0
	Self-care	Poor	43	17.1
Mothers Lifestyle Factors Nutrition		Fair	115	45.6
		Good	94	37.3
		Total	252	100.0
		Poor	43	17.1
	Nutuitian	Fair	96	38.1
l ie	ភ្នំ Nutrition	Good	113	44.8
l Si		Total	252	100.0
ੂ ਵ੍ਰੰ		Mild	158	62.7
≥	Stress	Moderate	87	34.5
		Sever	7	2.8
		Total	252	100.0
	Social relation	Poor	55	21.8
		Fair	161	63.9
		Good	36	14.3
		Total	252	100.0
		Poor	13	5.2
Overall life stude		Fair	230	91.3
Overall life style	Good	9	3.6	
		Total	252	100.0

Tab. 3. Mean differences in lifestyle factors based on illnesses.

History of Past or Present illnesses		Life style mean of score	p-value
Diabetes mellitus	YES	1.89	0.001
Diabetes meilitus	NO	2.04	Sig.
Hamandan sian	YES	2.05	0.001
Hypertension	NO	1.96	Sig.
Multiple programation	YES	2.25	0.001
Multiple pregnancies	NO	1.96	Sig.
	YES	2.00	0.820
Psychiatric illness	NO	1.98	N.S
	YES	2.00	0.820
Genetic abnormalities	NO	1.98	N.S

Independent Mann-Whitny U test, Kruskul Willes one way ANOVA, Sig=significant, N. S=Non-Significant,

CONCLUSION

Maternal lifestyle factors significantly impact pregnancy outcomes and child health. While most participants demonstrated fair lifestyle practices, there is a need for enhanced health education and support, particularly for women with chronic conditions. Primary healthcare centers play a vital role in promoting healthy behaviors among pregnant women in underserved areas.

p=value=0.05

RECOMMENDATIONS

Health education: Provide education on nutrition, exercise, and stress management for pregnant women,

especially those with chronic conditions.

Specialized care units: Establish specialized care units for women with diabetes, hypertension, and other chronic illnesses.

Community support: Expand community-based prenatal education and peer mentoring programs.

Technological solutions: Implement mobile health apps and telemedicine for remote monitoring and support.

Funding and resources: Increase funding for maternal health services in low- and middle-income countries to improve healthcare systems and community-based interventions.

- Carson SA, Kallen AN. Diagnosis and management of infertility: a review. Jama. 2021;326(1):65-76.
- Goske MJ, Strauss KJ, Coombs LP, et al. Diagnostic reference ranges for pediatric abdominal CT. *Radiology*. 2013;268(1):208-218.
- Livingstone S, Mascheroni G, Stoilova M. The outcomes of gaining digital skills for young people's lives and wellbeing: A systematic
- evidence review. New Media Soc. 2023;25(5):1176-1202.
- 4. Radesky JS, Kaciroti N, Weeks HM, et al. Longitudinal associations between use of mobile devices for calming and emotional reactivity and executive functioning in children aged 3 to 5 years. *JAMA Pediatrics*. 2023;177(1):62-70.
- Livingstone S, Nair A, Stoilova M, et al. Children's rights and online age assurance systems: The way forward. Int J Child Rights. 2024;32(3):721-747.