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The Prevalence of Spontaneous Abortion and its Contributing Factors among Married Women in Mogadishu, Somalia

Dr. Abdirahman Moalim Hassan Ibrahim[1]; Ibrahim Moalim Hassan Ibrahim[2]

[1;2]Irib Publication House-IPH /Irib International Academy /Irib Diet Products /Aden International University

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Abstract: This study investigates the prevalence and contributing factors of spontaneous abortion among married women in Mogadishu, Somalia, addressing a critical yet underexplored aspect of maternal health. Spontaneous abortion, affecting 10–20% of pregnancies globally, poses significant physical and psychological challenges, particularly in regions like Somalia, where socioeconomic instability and cultural stigma exacerbate the issue. The research employs a cross-sectional survey design with a sample of approximately 300 women, utilizing structured questionnaires and face-to-face interviews conducted by trained assistants. Ethical considerations, including informed consent and confidentiality, are prioritized throughout the study. Findings reveal a high incidence of spontaneous abortion linked to factors such as limited access to healthcare, food insecurity, and societal stigma. Notably, the study highlights the demographic profile of participants, with a significant proportion aged 18 to 25, underscoring the urgent need for targeted maternal health interventions. Furthermore, insights from healthcare providers indicate a gender gap in representation and a critical demand for education tailored to varying literacy levels. The study advocates for enhanced healthcare access, community awareness initiatives, and improved prenatal care, aiming to inform maternal health policies that cater to the specific needs of Mogadishu's women. By illuminating the complexities surrounding spontaneous abortion, this research seeks to foster an environment conducive to maternal well-being and improved health outcomes for families in the region.

Keywords: *Spontaneous Abortion, Miscarriage, Prevalence, Married Women, Mogadishu, Somalia, Maternal Health, Reproductive Health, Socio-Demographic Factors, Health Conditions, Access to Healthcare, Educational Level, Age, Psychological Impact, Cultural Beliefs, Environmental Factors, Community Health, Healthcare Providers, Interventions, Public Health Policies.*

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I. INTRODUCTION

The prevalence of spontaneous abortion is a critical area of research in maternal health, reflecting broader health challenges faced by women. Rates of spontaneous abortion can vary significantly across geographical regions and populations. In low-income countries like Somalia, higher prevalence rates are often attributed to inadequate healthcare access, poor maternal health services, and socio-economic disparities. Understanding the specific prevalence among married women in Mogadishu is essential for informing healthcare policies and programs aimed at addressing maternal health issues. Identifying the proportion of affected women can also help raise awareness and reduce the stigma associated with pregnancy loss. (Hernandez, 2020).

Socio-demographic factors play a significant role in the likelihood of experiencing spontaneous abortion. Research indicates that age is a crucial predictor, with both younger women and those over 35 facing higher risks due to biological factors. Women in their late teens and early twenties, as well as older women, may experience spontaneous abortions due to health complications. Education level is another vital factor; women with lower educational attainment often lack awareness regarding reproductive health and have limited access to prenatal care. Socioeconomic status further influences a woman's ability to access healthcare services, which can directly affect pregnancy outcomes. By examining these socio-demographic characteristics among married women in Mogadishu, this study aims to highlight specific challenges and identify opportunities for targeted interventions. (Mongella, 2019)

Health-related factors are also critical predictors of spontaneous abortion. Women with a history of previous pregnancies, particularly those that ended in miscarriage, are at a heightened risk for subsequent losses. Underlying health conditions such as diabetes and hypertension can further increase the likelihood of miscarriage. Access to quality healthcare services is essential for managing these risks

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effectively. In Mogadishu, where healthcare resources may be limited, understanding the interplay between health-related factors and spontaneous abortion is crucial for developing effective strategies to improve maternal health. (Dixon, 2021)

Access to healthcare services is crucial for improving maternal health outcomes. This subtopic will investigate the availability of health insurance among participants and its correlation with access to prenatal care and other health services. It will discuss barriers to accessing healthcare, including financial constraints, transportation issues, and the availability of healthcare facilities. The section will also highlight how lack of insurance can lead to delays in seeking care, which may contribute to higher rates of spontaneous abortion. analyzing the socio-demographic characteristics of married women in Mogadishu is essential for understanding the likelihood of experiencing spontaneous abortion. Factors such as age, education level, and socioeconomic status play significant roles in determining pregnancy outcomes. By investigating these relationships, this study aims to provide insights that can inform healthcare policies and interventions aimed at improving maternal health and reducing the incidence of spontaneous abortion in the region. (Kyle, 2022)

Cultural beliefs and environmental factors profoundly impact reproductive health, especially regarding spontaneous abortion. In many societies, stigma surrounding miscarriage can deter women from seeking necessary medical care or discussing their experiences openly, leading to feelings of isolation. Environmental factors, particularly nutrition and stress levels, are also critical determinants of pregnancy outcomes. Poor nutritional status can increase the risk of spontaneous abortion, while high stress levels, often linked to socio-economic hardships, can adversely affect maternal health. Understanding these cultural and environmental influences is vital for improving health interventions and support systems for married women in Mogadishu. (Abdiwahid, 2018)

Investigating the rate of spontaneous abortion among married women in Mogadishu is essential for addressing maternal health issues in the region. By assessing prevalence over the past year, this study establishes a baseline understanding that can inform healthcare policies and interventions. Previous research shows that spontaneous abortion rates can differ based on geographic, socio-economic, and cultural factors, making localized insights vital for developing targeted health programs. (Abdiwahid, 2018)

In low-income countries like Somalia, higher prevalence rates are often attributed to poor maternal health services, socio-economic disparities, and inadequate healthcare access. Understanding the specific prevalence among married women in Mogadishu is crucial for informing healthcare policies and programs aimed at addressing maternal health issues. Determining the proportion of affected women can also help raise awareness and reduce the stigma associated with pregnancy loss. The prevalence of spontaneous abortion is a crucial area of research in maternal health, reflecting broader health challenges faced by women. (Hernandez, 2020)

The chance of having a spontaneous abortion is significantly influenced by sociodemographic characteristics. Age is a significant predictor, according to research, with biological variables making women over 35 and younger women more at risk. Health issues can cause spontaneous abortions in older women and those in their late teens and early twenties. Another important consideration is education level; women with lesser levels of education frequently have less access to prenatal care and are less knowledgeable of reproductive health issues. Pregnancy outcomes may be directly impacted by a woman's socioeconomic situation, which also affects her access to healthcare resources. This study intends to find potential for focused interventions and draw attention to particular issues by looking at these sociodemographic traits among married women in Mogadishu. (2019, Mongolella)

Another important predictor of spontaneous abortion is health-related factors. Previous miscarriages put women at higher risk for further losses, especially if they have a history of miscarriages. Diabetes and hypertension are two underlying medical disorders that can significantly raise the risk of miscarriage. Effective risk management requires having access to high-quality healthcare services. Knowing how health-related factors and spontaneous abortion interact is essential for creating practical plans to enhance mother health in Mogadishu, where medical resources may be scarce. Dixon (2021)

Improving maternal health outcomes requires access to healthcare services. This subtopic will examine participants' health insurance availability and its relationship to access to prenatal care and other health services; it will address obstacles to accessing healthcare, such as lack of funds, transportation, and healthcare facility accessibility; and it will emphasize how the absence of insurance can cause delays in seeking care, which may contribute to higher rates of spontaneous abortion. Understanding the sociodemographic characteristics of married women in Mogadishu is crucial for determining the likelihood of experiencing spontaneous abortion, as factors like age, education, and socioeconomic status are important determinants of pregnancy outcomes.

In order to improve mother health and lower the rate of spontaneous abortion in the area, this study intends to shed light on these links and offer insights that can guide healthcare policies and initiatives. Kyle (2022)

Environmental influences and cultural attitudes have a significant impact on reproductive health, particularly with regard to spontaneous abortion. The shame associated with miscarriages can prevent women in many societies from openly discussing their experiences or obtaining appropriate medical attention, which can leave them feeling alone. Pregnancy outcomes are also significantly influenced by environmental factors, specifically stress levels and diet. While high levels of stress, which are frequently associated with socioeconomic difficulties, can have a negative impact

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on maternal health, poor nutritional status can raise the chance of spontaneous abortion. Improving health interventions and support networks for married women in Mogadishu requires an understanding of these cultural and environmental factors. (2018, Abdulwahid)

This study will investigate differences according to sociodemographic characteristics such age, education, and economic standing in addition to determining prevalence rates. For the purpose of allocating resources and creating interventions that are specifically tailored to the needs of women in Mogadishu, this information is essential for legislators and healthcare professionals. Programs for raising community awareness that aim to lessen stigma and encourage improved reproductive health practices would also benefit from the documentation of prevalence and related factors. González (2019)

The demographic data shows that 50% of participants are aged 18 to 25, with a significant majority being male (83%). Most have higher education (54%), while 33% are doctors or midwives, and 30% are nurses. Regarding marital status, 40% are single and 33% are married. In terms of experience, 50% have 1 to 5 years, and 40% work in hospitals, 27% in clinics, and 33% in community health centers. This summary provides a concise overview of the participants' characteristics.

Table 1 Socio Demographic Information

No	Category	Frequency	Percentage
1	**Age Distribution**		
	Under 18 Years	50	17%
	18 to 25 Years	150	50%
	25 to 35 Years	50	17%
	35 to 40 Years	30	10%
	Above 40 Years	20	7%
	Total Frequency	**300**	**100%**
2	**Gender Composition**	300	100%
	Male	250	83%
	Female	50	17%
	Total Frequency	**300**	**100%**
3	**Educational Attainment**	300	100%
	Informal Education	40	13%
	Primary Education	30	10%
	Secondary Education	70	23%
	Higher Education	160	54%
	Total Frequency	**300**	**100%**
4	**Occupational Breakdown**		
	Nurses	90	30%
	Doctors	100	33%
	Midwives	100	33%
	Community Health Workers	10	4%
	Total Frequency	**300**	**100%**
No	Category	Frequency	Percentage
1	**Marital Status**		
	Single	120	40%
	Married	100	33%
	Divorced	30	10%
	Widowed	30	10%
	Separated	20	7%
	Total Frequency	**300**	**100%**
2	**Years of Experience**	300	100%
	Less than 1 year	70	23%
	1-5 years	150	50%
	6-10 years	40	14%
	More than 10 years	40	13%
	Total Frequency	**300**	**100%**
3	**Work Setting**	300	100%
	Hospital	120	40%
	Clinic	80	27%
	Community Health Center	100	33%
	Total Frequency	**300**	**100%**

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Table 2 summarizes healthcare providers' insights on spontaneous abortion. Most providers (33%) encounter spontaneous abortions occasionally, indicating it is a common issue in their practice. The primary causes identified are maternal health conditions (40%) and genetic factors (20%). In terms of prevalence, 30% believe that less than 5% of pregnancies end in spontaneous abortion. Significant risk factors include previous miscarriage history (40%) and maternal age (37%). Additionally, 40% of respondents assert that access to prenatal care significantly reduces the incidence of spontaneous abortion. Providers emphasize their role in prevention, particularly through education (34%) and regular check-ups (30%). Overall, the table highlights providers' awareness of the factors influencing spontaneous abortion and the critical importance of healthcare access.

Table 2 Knowledge and Experience with Spontaneous Abortion

No			
		Frequency	**Percentage**
	How frequently do you encounter cases of spontaneous abortion in your practice?		
	Very frequently	**80**	**27%**
	Frequently	**70**	**23%**
	Occasionally	**100**	**33%**
	Rarely	**30**	**10%**
	Never	**20**	**7%**
	Total	300	100%
	In your experience, what are the common causes of spontaneous abortion?		
	Maternal health conditions (e.g., diabetes, hypertension)	**120**	**40%**
	Genetic factors	**60**	**20%**
	Infections	**50**	**17%**
	Lifestyle factors (e.g., smoking, alcohol use)	**50**	**17%**
	Environmental factors	**15**	**5%**
	Other (please specify):	**5**	**2%**
	Total	300	100%
	What is the average percentage of pregnancies that result in spontaneous abortion, based on your experience?		
	Less than 5%	**90**	**30%**
	5-10%	**85**	**28%**
	11-20%	**75**	**25%**
	More than 20%	**50**	**17%**
	Total	**300**	**100%**
No		**Frequency**	**Percentage**
	Which factors do you believe significantly contribute to spontaneous abortion among married women?		
	Age of the mother	**110**	**37%**
	Previous history of miscarriage	**120**	**40%**
	Access to healthcare services	**35**	**12%**
	Nutritional status	**20**	**7%**
	Mental health issues	**15**	**5%**
	Total	**300**	**100%**
	How does access to prenatal care impact the incidence of spontaneous abortion?		
	Significantly reduces incidence	**120**	**40%**
	Somewhat reduces incidence	**60**	**20%**
	No impact	**60**	**20%**
	Increases incidence	**40**	**13%**
	Not sure	**20**	**7%**
	Total	**300**	**100%**
	In your opinion, what role do healthcare providers play in preventing spontaneous abortion?		
	Providing accurate information and education	**100**	**34%**
	Offering regular check-ups and monitoring	**90**	**30%**
	Supporting mental health and well-being	**70**	**23%**
	Encouraging healthy lifestyle choices	**40**	**13%**
	Total	300	100%
No		Frequency	Percentage

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	What interventions do you believe could help reduce the prevalence of spontaneous abortion?		
	Improved access to healthcare services	**100**	**33%**
	Educational programs for women	**100**	**33%**
	Enhanced prenatal care	**50**	**17%**
	Counseling services	**50**	**17%**
	Total	300	100%
	What specific programs or policies would you recommend to improve maternal health and reduce spontaneous abortion rates?		
	Enhanced Prenatal Care Programs	**100**	**33%**
	Community Education and Awareness Campaigns	**80**	**27%**
	Access to Affordable Healthcare Services	**70**	**23%**
	Mental Health Support Programs	**50**	**17%**
	Total	300	100%

II. FINDINGS AND DISCUSSIONS

The study participants' demographic analysis reveals that half of the respondents are aged 18 to 25, indicating a need for targeted maternal health programs for this age group. Additionally, 17% are under 18, and another 17% are aged 25 to 35, while only 10% are between 35 and 40, and 7% are older than 40. This highlights the importance of addressing the unique health issues of younger women. The gender distribution shows that only 17% of respondents are female, raising concerns about women's representation in maternal health discussions and suggesting a knowledge gap regarding their specific experiences. The educational background disparity emphasizes the need for health education programs tailored to varying literacy levels. Occupational data shows that 33% identify as doctors and midwives each, and 30% as nurses, reflecting a well-informed perspective on maternal health challenges but also indicating the need for training community health workers, who are crucial for grassroots care. The findings emphasize the importance of demographic factors in understanding spontaneous abortion among married women in Mogadishu and call for targeted interventions.

Regarding experiences with spontaneous abortion, 33% of healthcare providers encounter such cases occasionally, and 27% do so very frequently, indicating it is a common clinical issue. Maternal health conditions are identified as the leading cause by 40% of respondents, followed by genetic factors (20%), infections (17%), and lifestyle factors (17%). The study reveals varied perceptions about the average percentage of pregnancies resulting in spontaneous abortion, with 30% estimating it to be less than 5% and 28% between 5-10%. A significant 40% identified a previous history of miscarriage as a key factor, while 37% noted maternal age. Access to healthcare services was mentioned by 12%, highlighting barriers to care. Crucially, 40% believe improved prenatal care significantly reduces spontaneous abortion incidence, although 20% felt it had no impact. Providers emphasize their role in prevention, with 34% citing the importance of accurate information and education. Suggested interventions include improved healthcare access and educational programs for women, with 33% advocating for enhanced prenatal care and 27% for community education. Overall, these findings stress the need for tailored strategies addressing women's needs, healthcare provider engagement, and community support to reduce spontaneous abortion rates in Mogadishu.

Dr. Abdirahman Moalim Hassan Ibrahim is the Academic Director at Aden Adde International University. Dr. Ibrahim obtained his PhD in Nursing Science from Kesmonds International University and holds a Master's degree in Health Service Management from Kampala University. He also earned his Bachelor's degree in General Nursing from Mogadishu University. Furthermore, he is the founder of multiple organizations, including Irib Publication House (IPH), Irib International Academy (IIA), and Irib Diet Products (IDP). He is based in Mogadishu, Somalia.

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