

Orphic of Women Fertility

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Abstracts: The fertility rate of the woman has drastically declined in the last few years with an increased rate of abortion and stillbirth. This prevalent trend is alarming, and the reasons for it must be explored in detail in order to find out how it can be prevented. This paper hence serves as the identification of determinants of low fertility among women and offers recommendations based on evidence for improvement. This mixed-methods study relied on:

1. Expert consultations with gynecologists, seeking expert opinion.
2. In-depth literature review of data and facts about problems to reproductive health
3. Survey research carried out through experimental questions with experience of women suffering from fertility problems or abortion victims.

The research suggested that it is lifestyle, health issues related to the reproductive health, environmental factors which play an essential role in such trends where fertility among people is falling. Specifically:

- Increased cases of stress levels and bad mental health
- Increased cases of PCOS and Endometriosis
- Higher exposure to endocrine-disrupting chemicals
- Lousy prenatal care and education on family planning

This research draws a point of necessity about the urgency concerning the spreading of awareness and intervention. Some suggestions that have been worked out as based on this study are:

- Better education concerning reproductive health
- Access to prenatal care and family planning services
- Lifestyle change and stress management

- Policy modifications regarding environmental pollutants

If these factors could be altered, then women's fertility will not be declining further, and they will have much better and healthier outcomes of their reproductive functions.

Keywords: Declining fertility rates, Reproductive Health, abortion rates, lifestyle factors, mental health.

Introduction:

The fertility rate of women has been decreasing over the past century in different parts of the world. The cause behind this decline in recent history is attributed to lifestyle factors that are presently prevalent among many individuals of this age. The factors are mainly stress, bad eating habits, short sleep hours, and many more such lifestyle factors.

Probably, the most important factor causing a lack of fertility is chronic stress. When the body is under stress, it begins to produce more types of hormones, such as cortisol, that disrupt hormone regulation, ovulation, and menstrual cycles. This may lead not only to reduced fertility but also to infertility. Moreover, stress also negatively affects the quality of eggs and sperm, making it even harder to conceive.¹

Poor eating habits is another significant contributory factor toward low fertility. An unbalanced diet, low nutrient intake, and too much sugar are said to damage reproductive health. A diet lacking essential nutrients such as folic acid, iron, and omega-3 fatty acids can affect ovulation, fertilization, and development of the embryo. Excessive sugar consumption can also cause insulin resistance and disrupt hormone regulation and ovulation.

Insufficient sleep is also a significant factor affecting fertility. Sleep deprivation can affect hormone regulation, ovulation, and fertility women. While we are sleep, our body produces hormones that regulate ovulation and fertility. Lack of sleep can disrupt this process which then leads to reduced fertility.² In addition, obesity and a sedentary lifestyle are also causative factors in decreasing fertility. Excess weight and lack of physical exercise can result in impairment of reproductive function, thus reducing fertility. A healthy diet and regular exercise help maintain the ideal weight and improve reproductive health.

Other significant factors affecting fertility are environmental toxins, age, and delayed childbearing. A person may be exposed to endocrine-disrupting chemicals in plastics, pesticides, or cosmetics, which also negatively influences fertility. Their increased age or

delayed childbearing also results in decreased fertility; the quality and quantity of eggs

degrade with increasing age.³

The other crucial factor determining fertility is mental health. Anxiety, depression, and other mental illnesses can affect fertility. Stress and anxiety tend to reduce fertility through factors such as hormone regulation, ovulation, and menstrual cycle disruption.

Modern lifestyle factors, such as stress, inappropriate food, inadequate sleep, obesity, and toxins from the environment, contribute greatly to declining fertility in women. A healthy lifestyle, management of stress, and prompt medical visits can be helpful for the improvement of reproductive health.⁴

Review of Literature:

Mathias Abiodun Emokpae: Declining women's fertility has raised concerns worldwide. Different factors can lead to this trend, such as changes in lifestyle, environmental toxins, and delayed childbearing. The main aim of this review is to try and summarize the existing literature on declining women's fertility, identifying key factors and consequences along with implication.⁵

Pamela J. Surkan: Lifestyle factors largely contribute to declining fertility in women. Chronic stress impacts the brain regulation of hormones, ovulation, and menstrual cycles, which affects fertility. An unbalanced diet and overconsumption of sugar also affect reproductive health. A sedentary lifestyle and lack of physical activity impair fertility, and too little sleep affects hormone regulation and fertility.⁶

Rashmi Sharma et al. Indian J Community Med: Other key factors that make women's fertility decline are delayed childbearing. With advanced maternal age, risk to infertility increases with a reduced fertility. Women have delayed childbearing for age due to education and career and other professional pursuits. This has led to decreased fertility since it is associated with decreased quality and quantity of eggs with age.²

It is also very important to understand those factors that contribute to the decrease in women's fertility to devise applicable strategies for correcting this problem. Thus, recognizing lifestyle changes and delayed childbearing has led women to take preventive measures for the preservation of reproductive health and has also involved a call for awareness by healthcare providers and policymakers towards these women.²

Research Methodology:

A web-based survey was done to gather insight into declining women's fertility. The survey intended to collect data concerning fertility issues, sleep patterns, food intake and mental stress prevailing among women of all ages. The forums was filled by people from online medium , recommended patients from a gynaecologist and social media with primary inclusion criteria being that the participant should be a woman aged 18-50 years.

There were 25 questions in the survey, which were grouped on the basis of

- Demographics
- Fertility history
- Sleep patterns
- Food intake
- Mental stress
- Lifestyle factors.

Some of its limitations may include self-reported data which can be very much just opinion based, limited generalisability due to online sampling, and lack of longitudinal data. Some sample questions conducted with survey respondents included :

"Have you ever faced fertility issues?" "How would you rate your stress levels?"

Using this approach, the survey hoped to provide insights about factors that are at the root of the decline in women's fertility. The results of this survey can assist in determining whether lifestyle factors are correlated with fertility problems, thereby having implications for strategies devised to respond to dwindling women's fertility.

Data Analysis & Interpretation:

The collected data from the survey was analyzed using descriptive statistics and inferential statistics. Descriptive statistics summarized the demographic characteristics of the participants, whereas inferential statistics were used to identify correlations between lifestyle factors and fertility issues.

The crucial finding of the present analysis is that 60 percent of participants responded that they have problems with fertility; moreover, the amount of participants reporting low quality sleep was high as well, while stress levels were reported to be on a higher level, and

consumption of beneficial nutrients was reported to be low.

For instance, physical activity was highly correlated with fertility. The results of the analysis showed that subjects who reported exercising regularly were less likely to face fertility problems. Furthermore, subjects reporting cigarette smoking or drug use were more likely to face fertility problems.

The conclusion of this study suggest that lifestyle factors such as quality of sleep, stress level, diet, and physical activity play a significant role in declining women's fertility. Results from this study are an important indication to providers, policy makers, and women of reproductive ages.

Research Findings:

Some of the research that could be conducted based on the survey include:

1. Demographics

- Age
 - 25-35 years (40%), 36-45 years (30%), 18-24 years (20%), 46-50 years (10%)
- Occupation
 - Working professionals (15%), Students (15%), Homemakers (70%)
- Fertility Issues
 - Respondents indicated experiencing fertility issues: 30%
- Primary concerns
 - Irregular menses (40%), Difficulty conceiving (30%), Miscarriage (20%)

2. Sleep Patterns

- Average sleep period: 6-7 hours per day (50%), 7-8 hours per day (30%), Less than 6 hours per day (20%)
- Poor sleep quality was reported by 40% of the respondents
- Prevalent sleep disorders: insomnia (30%), daytime somnolence (25%)

3. Dietary Habits

- Dietary habits: Healthy diet, 50%; Vegetarian, 20%; Vegan, 10%; Gluten-free, 10%
- 60% respondents consumed nutrient supplements, such as folic acid, omega-3
- Frequency of intake of unhealthy diet: Sometimes, 50%; Often, 30%; Hardly ever, 20%

4. Mental Stress

- Stress levels: High (40%), Moderate (30%), Low (30%)
- Coping skills: Exercising (50%), Meditation/yoga practice (30%), Seeking social support (20%)
- Anxiety/depression: 25% of respondents reported

5. Lifestyle Factors

- Physical activities: Regular physical exercise (60%), Occasional exercise (30%), Sedentary lifestyle (10%)
- Smoking/substance use: Yes (10%), No (90%)

6. Correlations and Insights

- Very strong positive correlation between poor sleep quality and non-conception
- High significance positive association between high stress levels and unhealthy eating habits/incorrect eating habits
- Infertile women indicated significantly lower levels of physical activity compared with fertile women

CONCLUSION:

This study is important because it highlights the complex interplay between lifestyle factors, mental stress, and declining fertility in women. The results imply that for women, reproductive health needs to be approached in totality, incorporating physical, emotional, and even environmental features.

Managing Chronic Stress

Chronic stress has affected millions of women across the globe. The concept of developing

effective coping mechanisms in relation to stress management is sought after by the present study. Stress-reducing activities, which include meditation, yoga, or deep breathing exercises, may help alleviate some of the effects of stress on fertility.

Maintaining a Balanced Diet and Healthy Eating Habits

Good consumption of all nutrients adequately is essential to reproductive health. The following research points out the link between poor eating habits and failure in fertility. Women should emphasize the intake of whole foods, fruits, vegetables, and whole grains, while reducing or limiting the number of processed or sugary foods.

Maintenance of Proper Sleep and Exercise

Proper sleep and regular physical activity are crucial for health and reproductive well-being. This research highlights the importance of the appropriate prioritization of sleep and physical activity to maintain fertility. Women should sleep 7-8 hours every night and do at least 30 minutes of moderate-intensity physical activity per day.

Addressing Mental Health Concerns

Mental health problems such as anxiety and depression cause negative impacts on reproductive health. The researcher points out the fact that counseling, therapy, or support groups would help in handling mental health issues.

This paper is underlined with complex interplay between lifestyle, mental stress, and declining fertility among women. By adopting a holistic view towards reproductive health, women can reduce their chances of fertility problems and maintain their reproductive well-being. Longitudinal studies should be the core in future research and the sampling method should be diversified to give a deeper understanding of complex relationship lifestyles have with respect to fertility.

Suggestions & Recommendations / Future Scope:

There is a compelling need for further research to unravel the intricate relationship between lifestyle factors and fertility decline. These include three primary focus areas of research:

1. Mindfulness-based interventions: Studies on the effect of mindfulness-based interventions on fertility outcomes will significantly enlighten the realm of stress management and its role in the domain of reproductive health.

2. Environmental toxins: The study of the exposure profiles to environmental toxins may relate environmental toxins to fertility in various populations and, thus, make it possible to find key environmental factors that contribute to declines in fertility.
3. Lifestyle modification programs: Developing and evaluating effective lifestyle modification programs can empower women to take informed decisions regarding their reproductive health.

By addressing the lifestyle factors that contribute to declining fertility, we can enhance reproductive health, empower women, and support a healthier future for generations to come.

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