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# The Effectiveness, Benefits, and Challenges of Fertility Awareness-based Methods of Family Planning

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## Abstract

The aim of this scholarly project was to evaluate data regarding the efficacy, challenges, and benefits of fertility awareness-based methods (FABMs) of family planning, in order to determine whether there are methods that may be considered effective and beneficial options. After reviewing the available literature regarding current FABMs, it became evident that there are, in fact, current methods available which are viable choices. The most effective methods according to this data are the ovulation and Sympto-Thermal methods, which have actual-use efficacy ratings that, when compared to the commonly prescribed oral contraceptive pill, would recommend them for use. The FABMs, as with all user-dependent family planning options, come with their own set of challenges which affect their actual-use efficacy rates. The FABMs also tout a set of unique benefits which recommend them for use. Though the FABMs may not be the family planning option of choice for all women, the evidence compiled in this review highly recommends them for further study and application. Motivated women who desire a natural option are excellent candidates for these methods.

## Introduction

The current, scientifically based FABMs offer “natural,” hormone and internal device-free options for women to decide when, and if, they choose to become pregnant.

- Based on physiologic markers of fertility: cervical mucus, basal body temperature, and urine hormone levels.
- No risk for the potential side effects of hormonal, surgical, and implanted methods of family planning.

## Statement of the Problem

- Need to evaluate the perfect-use and actual-use effectiveness of FABMs using the available research data.
  - Determine FABM viability as family planning option
  - Guide direction for future research, and the development of future family planning options.

## Research Questions

- “When compared to the perfect-use and actual-use effectiveness of other available methods of family planning, are there FABMs which can be considered effective family planning options
- “What are the perfect-use and actual-use effectiveness rates of avoiding pregnancy for the particular fertility awareness-based methods of family planning?”
- “Which FABMs have the highest efficacy rates?”
- “What are the challenges of particular FABMs which may affect their actual-use effectiveness?”

## Literature Review

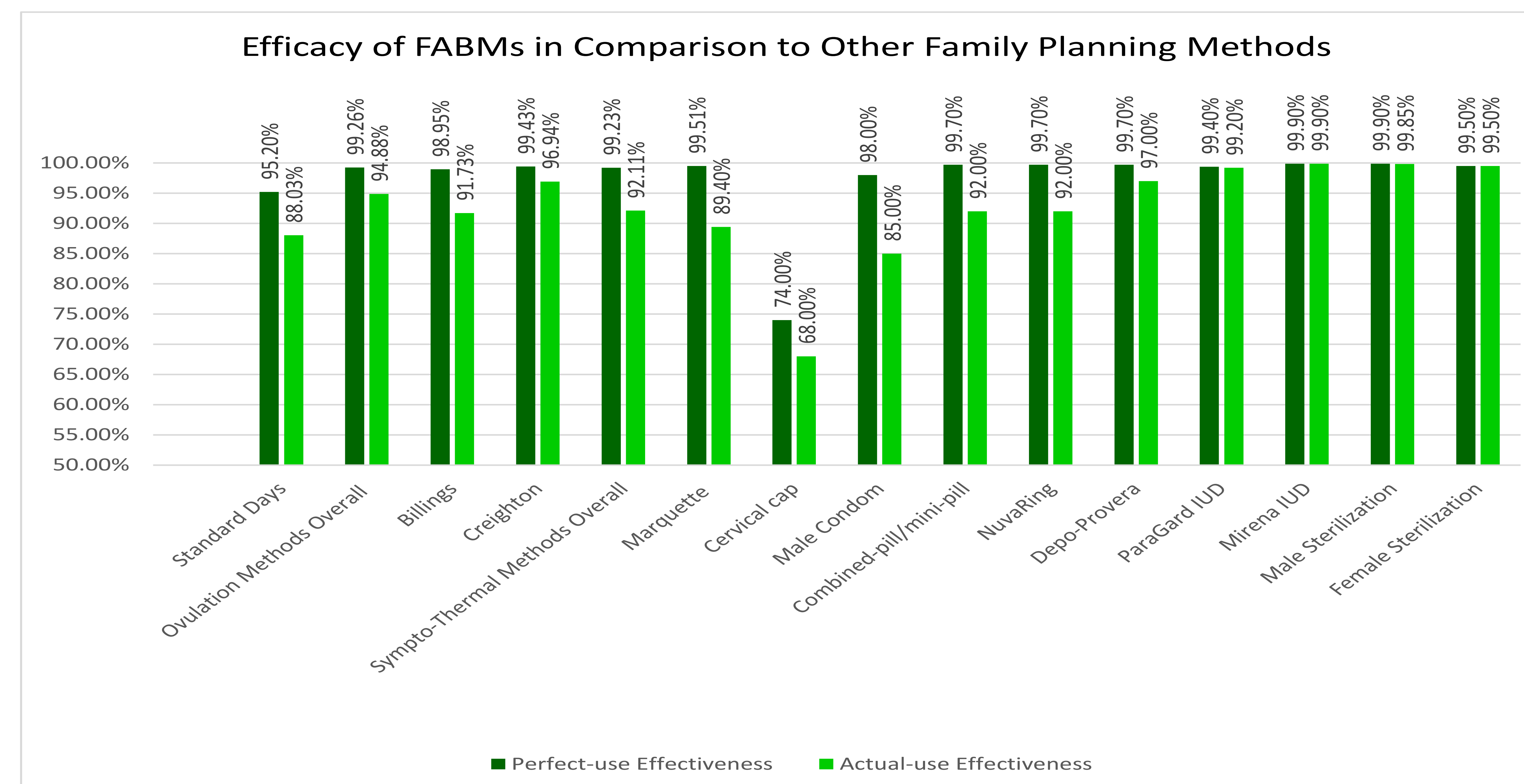
Table 2 Individual and Cumulative Efficacy Rates of FABMs

Method	N	Individual Perfect-use Effectiveness	Cumulative Perfect-use Effectiveness	Individual Actual-use Effectiveness	Cumulative Actual-use Effectiveness	Rate of Study Completion
Standard Days Method	562		95.20%		88.03%	
<i>Are'valo et al.</i>	478	95.25%		88.04%		46%
<i>Kursun et al.</i>	84	95%		88%		55.8%
Ovulation Methods	3506		99.26%		94.88%	
Billings Method	1388		98.95%		91.73%	
<i>Bhargava et al.</i>	500	98.9%		89.5%		76%
<i>Xu et al.</i>	688	98.98%		92.98%		80.15%
<i>Meng et al.</i>	200	NR*		93%		94.5%
Creighton Method	2118		99.43%		96.94%	
<i>Fehring et al.</i>	242	98.8%		98%		79.8%
<i>Hilgers et al.</i>	1876	99.5%		96.8%		NR
Sympto-Thermal Method	1922		99.23%		92.11%	
<i>Frank-Herrmann et al.</i>	900	99.4%		92.53%		84.07%
<i>Rice et al.</i>	1022	99.07%		91.74%		80.8%
Marquette Method ( <i>Fehring et al.</i> )	204	99.51%		89.4%		

\*NR – not reported  
Table 2

## Discussion

- The Creighton Model has the highest actual-use efficacy of the FABMs
- As a class, the ovulation methods had the highest reported actual-use efficacy, followed by the Sympto-Thermal methods.
- Overall the Marquette Method had an actual-use efficacy of 89.4%.
  - Couples who combined monitoring of cervical mucus and urine hormone levels had an actual-use efficacy of 92.2%.
- The Standard Days Method had the lowest actual-use efficacy of 88.03%.
  - User-related error
  - Training time
  - Negative psychological effects including insecurity and relational strain
  - SDM – required cycle regularity
  - MM - variability
- FABM challenges
  - User-related error
  - Training time
  - Negative psychological effects including insecurity and relational strain
  - SDM – required cycle regularity
  - MM - variability
- Method-user reported benefits
  - Flexibility
  - Positive psychological effects such as enhanced communication and respect between partners
  - Understanding of physiologic fertility cycle
  - Minimal cost
  - Low adverse effect profile
  - No educational level requirement



## Applicability to Clinical Practice

- The most efficacious FABMs have similar actual-use efficacy rates to OCPs and the hormonal vaginal ring.
  - This makes them viable family planning options
- User-related error is an important factor influencing the actual-use efficacy of user-dependent methods.
- The efficacy, requirements, benefits, and challenges of each particular method must be included in the patient/provider discussion.
- Efficacy data should be further disseminated to providers.
- The FABMs should be included in all family planning option discussions.

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