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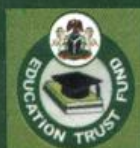
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ORIGINAL ARTICLE

Combined Oral Contraceptive Pills: Profile of Acceptors in a Tertiary Hospital In South-south Nigeria

Abasiattai A. M, Utuk M.N*, Ojeh S.O *. Eyo U.E

ABSTRACT

Background: Combined oral contraceptive pills were the first contraceptive method to provide sexual freedom of choice for women through reliable, personal and private control of fertility. They are the most widely used hormonal contraceptives and also the most popular non-surgical method of contraception. **Objective:** To review the profile of acceptors of combined oral contraceptive pills at the University of Uyo Teaching Hospital, Uyo. **Methodology:** An 8 year review of all clients that accepted combined oral contraceptive pills in the family planning clinic. **Results:** There were 1,146 new contraceptive acceptors during the period of study out of which 309 (27.9%) accepted the pills. Majority of the clients were between 20 and 29 years of age (54.0%), were multiparous (72.8%), Christians (99.7%) and 61.2% had tertiary level education. Two hundred and fifty-five women (82.5%) desired to use combined oral contraceptive pills to space births while 7.8% wanted to limit child bearing. There was a high discontinuation rate among the women (45.0%) and out of these 87.9% of the clients changed to other contraceptive methods. All the clients commenced their pills within seven days of menstruation and only the low dose monophasic preparations were available in the family planning unit and thus were given to the clients. **Conclusion:** Women who accept to initiate combined oral contraceptive pills in our center are young, well educated, multiparous women who want to space their pregnancies. However, due to the high discontinuation rate among the clients, there is need for further studies evaluating reasons for the high discontinuation rate, exploring interactions between clients and providers' and also providers' attitude towards combined pills in our environment.

Key words: Oral contraceptive pills, Acceptance, Nigeria

INTRODUCTION

Combined oral contraceptive pills (often referred to as birth control pills or simply, the pills) represent the most studied class of medications since they were introduced in 1960¹. They consist of a combination of a synthetic oestrogen and a progestogen and were the first contraceptive method to provide sexual freedom of choice for women through reliable, personal and private control of fertility². They are the most widely used hormonal contraceptives and also the most popular non-surgical method of contraception. Currently, they are used by more

than 100 million women worldwide³. Reports from studies in the United States of America indicate that they are used by about 12 million women, while one quarter of women aged 16-49 years in Great Britain and 40% of sexually active women in Holland use the pill^{3,4}.

When used correctly and consistently, combined oral contraceptive pills (COCPs) are among the most effective, reversible method of contraception with failure rates of 0.1 – 3/100 women years (Pearl index 0.16)⁵. They also have remarkable non-contraceptive benefits which include dramatic reductions in life time risks of ovarian and breast cancer and more variable reductions in the incidence of colorectal cancer, benign breast disease, uterine myomata, endometriosis, pelvic inflammatory disease, benign ovarian cysts and rheumatoid arthritis^{5,6}. A recent report revealed that use of COCPs has already prevented 200,000 ovarian cancers and 100,000 deaths from the disease⁷. In addition,

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Key words: Combined oral contraceptive pills, Uyo, Profile of acceptors

over the next decade, the number of cancers prevented is expected to rise to at least 30,000 per year⁷.

The development of low dose COCPs has led to a major change in hormonal contraception. Most of the pills in use today contain 30-35 micrograms or less of oestrogen and 400 micrograms or less of progestogen⁸. The introduction of the lower steroid dose formulations has led to a reduction in most side effects of the COCPs and they are much safer and equally very effective when compared to the previously used pills which contained 50 micrograms or more of oestrogen and which are no more marketed for contraceptive use in most countries^{1,6}.

Due to the paucity of data on the use of COCPs in our environment, this study which was conducted at the University of Uyo Teaching Hospital (UUTH), aims to review the profile of acceptors of COCPs in the center and compare with what obtains in other Nigerian centers.

MATERIALS AND METHODS

This retrospective study was conducted at the maternity unit of the University of Uyo Teaching Hospital located in Uyo, the capital of Akwa Ibom State in the South-South geopolitical zone of Nigeria. The registration numbers of all the clients that accepted COCPs between 1st January 2002 and 31st December 2009 were obtained from the family planning register. With the registration numbers, their record cards were retrieved and studied. Information abstracted included the socio-demographic characteristics of the clients, reasons for accepting COCPs, period of commencement of the pills, source of information concerning contraception and subsequent follow up. The data were analysed using frequency count and percentages.

RESULTS

During the period of study, there were 1,146 new contraceptive acceptors out of which 309 women (27.9%) accepted COCPs. The ages of the clients' ranged from 18 – 42 years with modal age group being 20-29 years (54.0%). Traders (24.9%), civil servants (14.9%), house wives (15.2%) and students (10.7%) constituted about 65.7% of the clients. Majority of the clients were multiparous (72.8%), Christians (99.7%) and 61.2% had tertiary level education (Table I).

Two hundred and fifty-five clients (82.5%) wanted to use COCPs for birth spacing, 24 (7.8%) wanted to limit child bearing, 8 (2.6%) were not certain why they decided to practice contraception, in 22(7.1%) cases; there was no documentation as to their reasons in their record cards.

Sources of information on contraception are shown in table 2. Two hundred and thirty one women (74.8%) obtained their information concerning contraception from health personnel, 12.9% of the clients obtained theirs from friends/relatives and 1.6% obtained theirs from the print media.

One hundred and forty-one clients (45.0%) were recorded to have discontinued COCPs.

Table 1: Socio-demographic characteristics of the clients

N=309

Variable	No (%)
Age (years)	
<20	14 (4.5)
20-29	167 (54.0)
30-39	116 (37.5)
≥ 40	12 (3.9)
Parity	
P0	37 (12.0)
P1-4	225 (72.8)
≥ P5	38 (12.3)
Not recorded	9 (2.9)
Educational status	
Primary level	34 (11.0)
Secondary level	69 (22.3)
Tertiary level	189 (61.2)
Not recorded	17 (5.5)
Occupation	
Trader	77 (24.9)
House wife	47 (15.2)
Civil servant	46 (14.9)
Student	33 (10.7)
Teacher	17 (5.5)
Seamstress	15 (4.9)
Professional	9 (2.9)
Unemployed	2 (0.6)
Not recorded	63 (20.4)

Table 2: Sources of information on contraception

N=309

Source	No (%)
Clinic personnel	231 (74.8)
Friends/Relatives	40 (12.9)
Radio/Television	27 (8.7)
Print media	5 (1.6)
Internet	4 (1.3)
Not recorded	2 (0.6)

Out of these 78 (25.2%) changed to an intrauterine contraceptive device (IUCD), 32 (10.4%) changed to injectable hormonal contraception, 14 (4.5%) changed to contraceptive implants (Jadelle), 9 (2.9%) decided to get pregnant while 6 (1.9%) did not have any reasons for discontinuing their pills.

All the clients commenced their contraceptive pills within seven days of menstruation. During the study period, only low dose monophasic preparations were available in the family planning unit and were thus given to the clients.

DISCUSSION

COCs have become an integral part of fertility choice in almost every country since its introduction in 1960². Though more popular in the developed world, recent reports indicate that they are increasingly being used by women in developing countries⁹⁻¹¹. In our center, COCs were most commonly accepted by young multiparous women who preferred to delay pregnancy. This is what obtains in other parts of Nigeria⁹⁻¹¹. In Nigeria, family planning programs often target their services to young married women who are in the mist of their childbearing years and want to space births¹². In addition, young Nigerian women are increasingly becoming aware of their reproductive health rights and also the advantages of utilizing modern contraceptive methods to either limit family size or delay child bearing. Age, marital status, desired family size, frequency of sexual intercourse, health concerns and exposure to sexual transmitted infections can all influence a woman's contraceptive use and choice of method¹³.

COCs were initiated by all the clients within the first seven days of menstruation. However, current recommendations support initiating the pills at any time during a woman's menstrual cycle as long as the provider is reasonably sure the client is not pregnant¹. In a recent study, the quick start approach (taking the first pill at the clinic in the presence of the provider regardless of the menstrual cycle day) was associated with higher continuation rates and clients were more likely to start the second pack of pills than women who initiated the pills after they left the clinic¹⁴. Unlike progestogen only pills, COCs, are not recommended for breastfeeding mothers because oestrogen diminishes the quality and

quantity of breast milk^{6,15}. However, they may be used 6 weeks post partum if lactation is well established and other options are not available or unacceptable. In non breastfeeding mothers, COCs can be initiated 3 weeks after delivery and also immediately after an abortion^{6,15}.

Low dose monophasic preparations (where each active pill in the cycle contains the same amount of hormones) were the only preparations available in the family planning clinic and thus given to the clients. Due to the continuous publicity regarding the metabolic side effects of the pills, multiphasic preparations (biphasic and triphasic) where varying doses of the steroids are given through a 21 day cycle were introduced to lower the amount of steroids while mimicking the hormonal peak and trough levels within the physiological menstrual cycle⁶. This was in an effort to achieve fewer metabolic effects and minimize the occurrence of breakthrough bleeding and amenorrhoea while maintaining efficacy^{6,16}. However, metabolic studies with multiphasic products have shown no outstanding advantages over the monophasic ones and they are much more expensive^{6,16}.

Almost half of the clients discontinued their pills and out of these, over half of them changed to another method of contraception. Due to the retrospective nature of the study, the reasons for the clients discontinuing COCs and changing to other contraceptive methods could not be determined as these were not documented in their record cards. However, available evidence shows that 25-36% of COCs users in developing countries discontinue them within a year of starting¹⁷. Surveys from several countries also show that most of the discontinuations are due side effects (such as changes in menstrual patterns, headaches, nausea and less frequently vomiting), health concerns and false rumours about health problems^{17,18}. A family health international study of perceptions of the pill safety in eight developing countries found that concern about pill use was universally high¹⁹. With the exception of two countries, more than 50% of the respondents thought the pill increased a woman's risk of infertility¹⁹. However, proper counselling about potential side effects and providing good management of medical concerns has been shown to improve use and typically, side effects diminish within a few months after a female begins oral contraceptive use¹.

The new COCPs, yasmin (containing an oestrogen and drospirenone-a progestogen with both anti androgenic and mineralocorticoid activity) and diane 35 (containing an oestrogen and the antiandrogen cyproterone acetate) have been introduced in the developed world. Yasmin which is as effective as other COCPs in preventing pregnancy (Pearl index 0.57) has several benefits due to the unique progestogen drospirenone²⁰. It reduces the incidence of acne and hirsutism, and causes less water retention and thus less fluid-related weight gain than other COCPs²¹. Diane 35 is also useful for women with symptoms of hyperandrogenism who require contraception¹⁶.

Majority of the women had their knowledge of family planning from clinic personnel. This is similar to what obtains in most parts of Nigeria and indeed Sub Saharan Africa¹⁰. Unfortunately, the attitude of health providers towards particular contraceptive methods in developing countries have been shown to influence continuation rates among clients through the kind of information they give when interacting with clients²². Hence, there is need to evaluate the interaction between clients and providers and also assess the quality of counselling and provider attitude towards COCPs, particularly as a significant number of the clients in our center changed to other contraceptive methods after discontinuing COCPs.

In conclusion, women who accept to initiate COCPs as method of contraception in our center are young, well educated, multiparous women who want to space their pregnancies. However, there is a high discontinuation rate among the clients. There is therefore need for further studies evaluating reasons for the high discontinuation rate, exploring interactions between clients and providers and also providers' attitude towards COCPs in our environment.

REFERENCES

1. Finger WR. Oral Contraceptives are very safe, very effective. *Network Family Planning Int* 1996; 16 (4): 4-5.
2. Fraser IS. Forty years of combined oral contraception: the evolution of a revolution. *The Medical J Aus* 2000; 173:541-544.
3. Mosher WD, Martinez AM, Chandra A, Abma JC, Willson SJ. The Use of Contraception and use of family planning services in the United States: 1982-2002. *Adv Data* 2004; 350: 1-36.
4. Taylor T, Keyse L, Bryant A. Contraception and sexual Health 2005/2006. London: office for National Statistics.
5. Russell R, Kingsland C. The risks and benefits of the combined oral contraceptive pill. *J R Coll Physician Edinburgh* 2008; 38: 224-227.
6. Speroff L, Glass R, Kase NG. Oral contraception. *Clinical Gynaecologic endocrinology and infertility*. 15th ed Philadelphia. Williams & Wilkins. 1994. 715-764.
7. Collaborative Group on epidemiological studies on ovarian cancer. Beral U, Doll R, Hermon C et al. Ovarian cancer and oral contraceptive: Collaborative re-analysis of data from 45 epidemiological studies including 23,257 women with ovarian cancer and 87,303 controls. *Lancet* 2008; 371 (9609): 303-314.
8. Abasiattai AM. Current concepts in contraception. *Nig J Med* 2006; 15 (4): 364-372.
9. Mairiga AG, Kyari O, Audu B, Lawuwa BM. Socio-clinical characteristics of modern contraceptive users at the University of Maiduguri Teaching Hospital. *Nig J Clinical Practice* 2007; 10 (2): 152-155.
10. Abasiattai AM, Bassey EA, Umoiyoho AJ. Contraceptive practice in a tertiary hospital in South-South Nigeria. *Sahel Med J* 2009; 12 (2): 68-72.
11. Mutihir JT, Dahala HL, Madaki JKA. Contraceptive pattern at a health center in a sub-urban setting. *Trop J Obstet Gynecol* 2005; 22 (2): 144-147.
12. Oye-Adeniran BA, Adewole IF, Umoh AV, Oladokun A, Gbadegesin A et al. Sources of contraceptive commodities for users in Nigeria. *PLoS Med* 2005; 2(11): e306.
13. Barnett B. Life stages affect method use. *Network Family Health Int* 1995; 15 (3): 14-17.
14. Westhoff C, Kerns J, Morroni C, Cushman LF, Tiezzi L, Murphy PA. Quick start: A novel oral contraceptive initiation method. *Contraception* 2002; 66 (3): 141-145.
15. Keller S. When to begin postpartum methods. *Network Family Plan Int* 1995; 15 (3): 18-23.
16. Glasier A. Contraception. In Edmonds DK (ed) *Dewhurst's textbook of Obstetrics & Gynaecology*. 7th Ed Oxford 2007 Blackwell Publishing 299-317.
17. Khan MA. Side effects and oral contraceptive discontinuation in rural Bangladesh. *Contraception* 2001; 64: (3): 161-167.
18. Dominican Republic: Demographic and Health Survey 1991. Peru: Demographic and Health Survey 1991-1992. Calverton, MD: Marco international Inc, 1992.
19. Grubb GS. Women's perceptions of the safety of the pill: A survey of eight countries. *J Biosoc Sci* 1987; 19 (3): 313-21.
20. Sillem M, Schneidereit R, Heithecker R, Mueck AO. Use of an oral contraceptive containing drospirenone in an extended regimen. *European J Contraception & Reprod Health Care* 2003; 8 (3): 162-169.
21. Oelkers W, Foidart JM, Dombrovicz N, Welter A, Heithecker R. Effects of a new oral contraceptive

containing an antimineralocorticoid progesterone, drospirenone on the rennin aldosterone system, body weight, blood pressure, glucose tolerance and lipid metabolism. The Jour Clin Endocrinology & Metabolism 1995; 80 (6): 1816-1821.

22. Tolley E, Loza S, Kafafi L, Cummings S. The impact of menstrual side effects on contraceptive discontinuations: findings from a longitudinal study in Cairo Egypt. International Fam Plann Perspectives 2005; 31 (1): 15-23.