Strategies to improve adherence and acceptability of hormonal methods for contraception

In this review, strategies (routine counselling, repeated structured counselling, group motivation, etc.) to improve adherence to, and continuation of, hormonal contraceptives were not found to be effective.

RHL Commentary by Goonewardene M

1. EVIDENCE SUMMARY

Six randomized controlled trials have been reviewed and all six trials had certain methodological concerns (1). Five of those studies had significant limitations such as small sample size or high loss to follow up.

The study which had the lowest loss to follow up (2) showed that compared to routine counselling, with repeated structured counselling women were less likely to discontinue depo- medroxyprogesterone acetate (DMPA) at 12 months (odds ratio [OR] 0.27; 95% confidence interval [95% CI] 0.16–0.44) and they were less likely to discontinue it due to menstrual disturbances (OR 0.20; 95% CI 0.11-0.37).

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Another study (3) found no benefit of postal or telephone call reminders compared to the routine appointment card in improving 'on time injections' of DMPA and its continuation rates at 12 months. However there was a 34-38% loss to follow-up.

Another study (4) showed that with group motivation by specially trained nurses, women were less likely to discontinue a contraceptive due to dissatisfaction with the selected method (OR 0.61; 95% CI 0.38–0.98). However both hormonal and non hormonal methods were included.

A comprehensive search appears to have been carried out and eligible studies selected and reviewed. However the studies were small in number and of suboptimal quality. Furthermore, as the methods of contraception used by the women as well as the type of intervention varied from study to study, a meta analysis has not been carried out. Therefore, this review could not show a definite benefit of strategies to improve adherence and continuation of hormonal contraceptives.

2. RELEVANCE TO UNDER-RESOURCED SETTINGS

2.1. MAGNITUDE OF THE PROBLEM

Hormonal contraceptives have high efficacy and injectables such as DMPA are popular in the developing countries. Their actual effectiveness is much less because of poor adherence to the regimen as well as high discontinuation rates mainly due to side effects. Up to 47% and 22% of women may miss one or more and two or more combined oral contraceptive pills (COC) respectively, and up to 22% of women may discontinue DMPA by the end of 12 months. (5, 6)

The low effectiveness can result in unwanted pregnancies which could lead to unsafe abortions especially in under resourced settings. Up to 75% of women undergoing an induced abortion may do so as a method of family planning (7). It is estimated that annually approximately 19 million unsafe abortions are carried out globally and up to 70,000 women may die as a result. The majority of these deaths occur in developing countries in under resourced settings (8). Improving adherence and the long term continuation of hormonal contraceptives is important from a public health perspective.

2.2. APPLICABILITY OF THE RESULTS

Motivation and reinforcement of knowledge by repetition of input are known to improve knowledge and attitudes of the recipient. The two studies, which showed an improvement by adopting the strategies of motivation and structured repeated pre and post treatment counselling especially regarding potential side effects were carried out in relatively under-resourced settings compared to the other four. Therefore, these strategies could be adopted in under resourced settings, and they could lead to better adherence to and continuation rates of hormonal contraceptives.

2.3. IMPLEMENTATION OF THE INTERVENTION

Motivation and repeated intensive counselling could be easily implemented by timing the follow-up visits to coincide with the three monthly repeat injection time of DMPA. Three packs of COC could be prescribed at a time to enable the same strategy to be adopted. The service provider should be adequately trained to motivate and counsel the women. Information leaflets could be given to the women to reinforce counselling In addition to medical officers even nurses and family health workers could be trained for this purpose and it could be implemented in under-resourced settings.

3. RESEARCH

The hypothesis that motivation of the client and greater client provider interaction with repeated intensive counselling could increase adherence to and continuation of hormonal contraceptives needs to be confirmed. Further research with well designed multi centre randomized controlled trials to establish this as well as to identify the effective intervention strategies is necessary. When designing and conducting such studies one difficulty would be to prevent interaction of women who had an intervention with those who had the routine service pattern (i.e. contamination).

References

1. Halpern V, Grimes DA, Lopez L, Gallo MF. Strategies to improve adherence and acceptability of hormonal methods for contraception. *The Cochrane Database of Systematic Reviews*;Issue 1, 2006.
2. Canto De Cetina TE, Canto P, Luna MO. Effect of counselling to improve compliance in Mexican women receiving depot-medroxyprogesterone acetate. *Contraception* 2001;63:143-146.
3. Keder LM, Rulin MC, Gruss J. Compliance with depot- medroxyprogesterone acetate: a randomiz controlled trial of intensive reminders. *American Journal of Obstetrics & Gynaecology* 1998;179:283-585.
4. Andolsek L, Pretnar A. Influence of counselling in postabortal contraception. *Presented at Reproductive Health Care International Symposium*;1982 Oct 10 -15; Maui, Hawaii.
5. Rosenberg MJ, Waugh MS. Compliance counselling and satisfaction with oral contraceptives: a prospective evaluation. *Family Planning Perspectives* 1998;30:89-92.
6. Lei ZW, Wu SC, Garceau RJ, Jiang S. Yang QZ, Wang WL et al. Effects of pretreatment counselling on discontinuation rates in Chinese women given depo-medroxyprogesterone acetate for contraception. *Contraception* 1996;53:357-361.
7. Perera DC , Rajapaksa LC. A community based study on social demographic characteristics of women reporting an induced abortion. *Ceylon Journal of Medical Science* 1991;34(2):63-74.
8. *Unsafe abortion: global and regional estimates of the incidence of unsafe abortion and associated mortality in 2000. Fourth edition.* Geneva: World Health Organization; 2004.

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