## Oral Contraceptives, Thrombosis, and Cyclical Factors Affecting Veins

SIR,—Mr. R. T. Payne (1 January, p. 51) has drawn attention to cyclic changes in superficial veins and believes they may be related to endocrine factors. With the possible validity of this general thesis I have no quarrel. When, however, he seeks to advance it as support for a relationship between the use of oral contraceptives and the development of thrombophlebitis he must, I believe, be challenged.

Though the incidence of thrombophlebitis in non-pregnant women is not known for certain, the best estimates place it between 1 and 3 per 1,000 per annum; the College of General Practitioners and General Register Office Survey quotes a figure of 2.2.1 The incidence in women using oral contraceptives is also uncertain because of incompleteness of reporting and bias in the selection of patients, but in no reported series has it exceeded the above figure. In the "25-month club" study in the United States, involving 11,711 women who had used norethynodrel/ mestranol for 25 months or more, the crude thrombophlebitis rate was reported as 2 per 1,000 per annum. Contrary to what is so often supposed, thrombophlebitis is not more common in pregnancy; it is only during the puerperium that the incidence is increased by some 4 to 6 times,2 but at that time the hormone levels, so markedly raised in pregnancy, are low. can be no doubt that the high incidence of puerperal thrombosis, like post-operative thrombosis, is primarily due to trauma and to local alterations in blood circulation.

Though morbidity data for thromboembolic disease are subject to an element of uncertainty, mortality data rest on a surer basis. The Wright Committee<sup>2</sup> was unable to establish a statistical relationship between thromboembolic death and the use of oral contraceptives in the United States, while the same is true for the United Kingdom, as judged by the number of thromboembolic deaths reported to the Committee on Safety of Drugs for the 12 months to 31 August 1965.3 In the United States the vital statistics for the years 1950 to 1964 inclusive show an increase in the age-specific death rates from thromboembolic disease, but the rise is similar for males and females while the trend for females shows no inflection from 1960 onwards, when oral contraceptives came increasingly into use. The extent of this increase can be judged from the number of users estimated by the Food and Drug Administration, viz:

> 1961 408,000 1962 1,187,000 1963 2,235,000 1964 3,950,000 5,000,000 1965

In the United Kingdom the age-specific death rates for this condition, for persons of either sex under the age of 45, have shown no change during the past 10 years.

Recent reports of the occurrence of arterial thrombosis (mainly cerebral and coronary) among oral contraceptive users have suggested that this may represent a different and more serious hazard than venous thrombosis.4-7 However, here again the expected frequency of comparable events among non-users of similar ages has been ignored, for in fact the death rates show no significant difference. In a study of arterial occlusion reported from the National Hospital, Queen's Square, London, no change was found in the rate per annum of the number of cases seen between 1955 and 1965 despite the fact that oral contraceptives did not come into general use in the United Kingdom until 1961 and that the number of users has increased rapidly since then. In the United States it is estimated that during 1964 one-tenth of the 40 million women of child-bearing age were using oral contraceptives, and yet the death rate from cerebrovascular accidents for women of this age group has shown

no significant change during the period from 1950 to 1964 inclusive. Contrary to what appears to be the general view, cerebrovascular lesions are a common cause of death in women of child-bearing age in the United States, as is shown by vital statistical data for 1960, a year well before oral contraception became spread; they ranked, by half-decades of life, as fourth to sixth among white females aged 25 and as first and second causes for non-white females of the same age group.

At present, though thromboembolic disease cannot definitely be excluded as a consequential risk of oral contraception, it is certainly fair to say that there is no evidence for such a risk. To put the matter still further into perspective, it has been calculated that the number of deaths attributed (rightly or wrongly) to oral contraceptive use in the United States is several times less than that of the maternal deaths in the pregnancies which would have resulted had all the women who used oral contraceptives had to rely upon other methods of birth control.-I am,

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## Abortion Law Reform

SIR,—The controversy regarding reform of the laws relating to deliberate termination of pregnancy has not yet been resolved within the medical profession, nor does there appear to have been any statement from a body of practising gynaecologists on their personal attitude to this matter. It was in order to test such an opinion that my colleague Mr. G. S. Lester and I circulated the memorandum which appears below to the practising gynaecologists among the Fellows and Members of the Birmingham and Midland Gynaecological and Obstetrical Society asking for their comments under one of the four following headings:

- (a) I support this memorandum and my name may be quoted.
- (b) I support this memorandum but I would rather not have my name published.
- (c) I support the memorandum in principle but with certain reservations.
  - (d) I do not support this memorandum.

The results to date are as follows: 55 gynaecologists have given unqualified support, though three asked for their names not to be published. Ten support the memorandum but with certain reservations, although in some cases these affect the terminology rather than the substance of the memorandum. There are only three who do not support it.

## Case against Abortion Law Reform

The deliberate termination of a pregnancy differs fundamentally from any other surgical operation in that its effects are widespread throughout society. Consequently this procedure is one of the few occasions on which the surgeon is bound by principles additional to those applicable to the immediate and apparent welfare of his patient.

The effect of the operation upon the foetus is obvious. The physical effect on the patient is seldom serious, and with proper care there should be few complications. The emotional effects may be more complex, and even with more than one psychiatric opinion it may be impossible to foretell her reactions in later life. There is also an effect upon the surgeon and those who assist him. Many gynaecologists feel an instinctive repugnance for the procedure often coupled with some measure of guilt that may vary according to the size and maturity of the foetus that is to be destroyed.

The effect upon society of the frequent performance of this operation is difficult to estimate. On the one hand the public may be glad to feel that doctors have regard for their health in helping them to produce families of the proper quantity and quality. On the other hand the frequent termination of pregnancy for social and inappropriate reasons, especially when extra-marital, may lead the public to question the regard of the medical profession for the sanctity of human life. There may even be some degradation of character among those who find themselves terminating pregnancies with undue frequency.

In consequence of the above, the decision of the doctor as to whether or not any particular pregnancy should be terminated may well involve the most difficult consultation. There will be occasions when on account of pre-existing severe physical or emotional disorder most gynaecologists will advise termination and carry it out, often with sterilization. There will be many others on which it may seem obvious that from all viewpoints it would have been better had the pregnancy never been conceived, yet its deliberate destruction cannot be advised. There will again be others, rejected by the parents in the early months, that will bring pride and joy when ultimately the child is born.

Many gynaecologists feel that the medical profession (and in particular the family doctor) is at present best able to reach the proper decision in each case, and that any change in the law that might appear to give a patient a right to demand an abortion must be resisted. We consider that the present state of the law of England is satisfactory for discharge of this onerous duty by the medical profession, protecting all who honestly consider the welfare of the patient and of society. Any reform of statute law to attempt codification of those cases in which pregnancy is commonly and legitimately terminated to-day would further complicate and delay these difficult consultations by introducing the new factor of legality-for example, what constitutes rape?

It seems doubtful whether most British gynaecologists would alter their present practice however the laws relating to abortion were to be liberalized, and they would wish to retain the right to be personally responsible for the final decision.

In view of the fact that deliberate terminations of pregnancy will usually be carried out by practising gynaecologists, it might seem appropriate that their opinion as stated above should be made more widely known. I would like to take this opportunity of thanking them all for their prompt replies and most helpful observations, which I was extremely glad to receive.-I am, etc.,

WILFRID MILLS. Birmingham 15.