nancy terminated by hysterotomy. We therefore thought it worth while to examine our material, since we have used hysterotomy routinely for many years for late legal abortion.

From 1962 to 1970 a total of 1,031 pregnancies were legally interrupted by hysterotomy in the 16th to 24th week. Of the 198 subsequent pregnancies in 174 of the women, 185 (93%) ended in delivery by the vaginal route and 13 (7%) were terminated by caesarean section. In none of them had uterine rupture occurred or had surgery been indicated by threatening rupture. However, in one of the women in whom caesarean section was indicated by premature detachment of the placenta the wall of the uterus was very fibrotic in the area of the old scar. At digital dilatation of the incision in the uterine wall for removal of the child a large rupture occurred and made hysterotomy necessary.

In a previous investigation Astedt[1] reported uterine rupture in 83 of all 407,340 deliveries in Sweden in 1956-61. Only three occurred in scars after previous hysterotomy for legal abortion—in one case after a transverse incision of the fundus and in two after a longitudinal incision. In our own series a low transverse incision in the least contractile segment of the uterus had been used.

We share the opinion that attention should be paid to the risk of rupture of the previously wounded uterus. On the other hand, late abortion by hysterotomy does not imply such a mental strain on the patient as vaginal delivery of a dead fetus. We therefore feel that the minor risk of uterine rupture during subsequent pregnancy is no reason to restrict the use of hysterotomy.—We are, etc.,

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1 Astedt, B., *Acta Obstetricia et Gynecologica Scandinavica*, 1967, **46**, 168.

Smoking and Leucocyte Counts in Pregnancy

SIR,—In 1971 Howell[1] reported the mean erythrocyte sedimentation rate to be about 10% higher in cigarette smokers than in non-smokers and a striking increase in mean white blood cell counts in heavy smokers as compared with non-smokers. Corre *et al.*[2] showed that the increase in white cell count is most pronounced in those who inhale and confirmed Howell's findings on white cell counts. As there is known to be a progressive leucocytosis during pregnancy a study was carried out to find out whether cigarette smoking had any effect on this leucocytosis.

Women aged 15 to 43 attending an antenatal clinic during September 1971 were classified into smokers or non-smokers. Each patient was asked about the total number of cigarettes smoked and whether she inhaled. All smokers who said they never inhaled or who admitted to having given up smoking before or after becoming pregnant were excluded from the study. Patients who had any degree of pre-eclampsia or had symptoms or signs of infection were also excluded. All total and differential leucocyte counts were determined in a routine way by the same technician, who was unaware of the smoking habits of the patients.

Mean Leucocyte Counts (/mm³) in Smokers and Non-Smokers at Different Periods of Pregnancy

	<21 Weeks				21-30 Weeks				31-40 Weeks			
	Smokers (39)		Non-smokers (59)		Smokers (73)		Non-smokers (75)		Smokers (112)		Non-smokers (179)	
	No.	%	No.	%	Mean	%	Mean	%	Mean	%	Mean	%
Total Leucocytes	9,244	100	9,005	100	9,938	100	8,768	100	10,150	100	9,193	100
Polymorphs	6,521	71	6,416	71	7,421	75	6,448	74	7,464	73·5	6,652	72
Lymphocytes ..	2,243	24	2,151	24	2,116	21	1,872	21	2,235	22	2,095	23
Monocytes	349	4	291	3	272	3	301	3	333	3	302	3
Eosinophils	95	1	121	1	103	1	128	1	98	1	123	1
Basophils	32	0·4	26	0·3	26	0·3	19	0·2	23	0·2	22	0·2

Over the whole span of 40 weeks smokers showed an average increase of 906/mm³ in total leucocyte count and 943/mm³ in polymorphs, both increases reaching statistical significance (see table). No such increases occurred among non-smokers. The differences between smokers and non-smokers for both counts were not significant up to 20 weeks, but were highly significant ($P<0·001$) between 21 and 30 weeks and between 31 and 40 weeks. Though the average total leucocyte count for smokers increased in successive periods the differential count remained roughly the same in both smokers and non-smokers, suggesting that smoking affects all types of leucocytes equally.

These results show that there is a clear relation between an increase in leucocyte count and cigarette smoking in pregnancy when the patient inhales and that this increase is maintained as pregnancy advances. It is known that smoking in pregnancy has other measurable biological effects,[3-5] and recently autoantibodies in non-pregnant smokers have been demonstrated.[6] This last effect may, in some way, explain the different white cell counts of both pregnant and non-pregnant smokers. This study has shown that cigarette smoking has such profound biological effects on the mother that it may contribute some further clues towards resolving the present controversy between Goldstein[7] and Yerushalmy[8] in deciding whether the effects of smoking on the child are due to "the smoker or the smoking."—I am, etc.,

JOHN MCGARRY

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1 Howell, R. W., *Lancet*, 1970, **2**, 152.
2 Corre, F., Lellouch, J., and Schartz, D., *Lancet*, 1971, **2**, 632.
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Adverse Reactions to Alclofenac

SIR,—The Committee on Safety of Medicines is currently reviewing adverse reactions to the antirheumatic drug alclofenac (Prinalgin) as its use appears to be associated with a relatively high incidence of adverse effects. A summary of the reports we have received is presented in the table.

Some skin reactions were associated with systemic disturbances, often severe enough to prevent the patients from pursuing their normal daily activities.

Type of Reaction	No.	%
Rash without systemic disturbance ..	168	74
Rash with systemic disturbance ..	34	14
Gastrointestinal haemorrhage or other symptoms	7	3
Other reactions (oedema, vasculitis, etc.)	21	9
Total	230	100

To enable us to assess the importance of this problem the committee invites information regarding any instance of serious adverse reactions suspected to be due to alclofenac. It may be convenient to use the committee's pre-paid yellow card for this purpose.—I am, etc.,

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R.M.N. versus C.M.B.

SIR,—A proportion of successful final-year general trainee nurses spend an extra 12 months obtaining their midwifery certificate without seriously intending to make full use of it in their future nursing career. Where this is the case encouragement should be given by sister tutors for nurses oriented towards psychiatry to follow this up and spend a year becoming a Registered Mental Nurse. Even if such general and pscyhiatrically trained nurses were working in a general hospital, their psychiatric qualifications would not be out of place, and they would be of considerable help in understanding and nursing patients whose illnesses contained a degree of behavioural disorder due to psychic stress.[1] The value of their general certificate, if employed in a psychiatric hospital, is equally obvious.—I am, etc.,

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Western Australia

1 Vann, D., *Medical Journal of Australia*, 1973, **1**, 518.

Consultant Contract

SIR,—In the report of a subcommittee of the Hospital Junior Staffs Group Council on the proposed new contracts for hospital junior staff (*Supplement*, 10 November, p. 31) the following statement appears: "It is now the law that an employee's contract must state his hours of duty."

My maximum part-time consultant contract does not specify hours to be worked. I have recently been asked to transfer this

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