

of tetanus is always something of a nightmare. Especially is this so in boys' schools, as wounds and injuries are relatively more frequent and more severe, particularly in the rugged term.

The whole question of serum reactions and serum sensitivity tests has been discussed with great clarity and usefulness by Drs. L. J. M. Laurent and H. J. Parish in the Refresher Course (June 14, p. 1294), and their article has stimulated me to put forward a suggestion that a new procedure might be well worth while in the prophylaxis of tetanus and the avoidance of anaphylaxis, for these two problems are so interrelated that they must be considered together.

Active immunization by tetanus toxoid is accorded a general blessing in the *Public School Handbook of Communicable Diseases* issued by the Medical Officers of Schools Association, but, so far as I am aware, few schools actively encourage it. Therefore, in the questionnaire it is usual to send out before entry to school, it appears to me that information should be asked specifically about a previous history of asthma, infantile eczema, or a previous dose of serum, and where a positive answer is returned it is justifiable to urge that active immunization should be carried out and that a certificate to this effect be produced on entry to the school. Alternatively, permission should be asked for the medical officer to carry out such immunization after entry. In the event of refusal of such advice one might reasonably feel a sense of relief from responsibility in case of any untoward event. It would also constitute a positive policy, and I think a reasonable one, for dealing with a somewhat vexed and thorny problem.—I am, etc.,

Mill Hill School, N.W.7.

A. H. MORLEY.

Bilateral Phaeochromocytoma

SIR,—A woman aged 29 was admitted to hospital on February 28 in a state of coma. She was married, with two children. The history obtained from the husband was :

On the morning of admission, and all of a sudden, the patient vomited about two pints (1 litre) of dark brown fluid and then collapsed and lost consciousness within a few hours. For the last two years she had been complaining of paroxysmal attacks of severe headache on and off, but she had never seen a doctor. During the last two months she had had some pain in the lower back, more towards the right side. Apart from this she had never had any other complaints. Her appetite was good, the bowels regular, and there was no urinary trouble. There had lately been some gain in weight.

There was nothing relevant in the past illnesses or family history.

On examination the patient was found to be deeply in coma, dyspnoeic, cyanosed, and with cold clammy skin. The pulse was imperceptible and the blood pressure could not be measured. The pupils were markedly dilated, equal, and not reacting to light. Reflexes were absent everywhere. Heart sounds were very weak and there were fine moist crepitations all over the chest. As the patient was in a terminal state, complete and thorough examination was almost impossible. She was given oxygen and nikethamide, but she died within half an hour of admission.

At necropsy the stomach showed some congestion, with small petechial haemorrhages. The right adrenal gland was replaced by a large spherical tumour, reddish brown in colour, weighing 43 g. and measuring 12 by 10 by 9 cm. Microscopically the tumour was composed of cells which varied greatly in size and shape, but tended to be polygonal: the cytoplasm was eosinophilic and the nuclei were sharply demarcated and contained abundant chromatin. Many cells contained several nuclei, and some cells contained a large bizarre, folded nucleus. No mitoses were seen. The tumour was richly vascular and showed capillaries and sinusoidal blood spaces, forming a stroma for the cells, together with a delicate connective tissue. The tumour was encapsulated. The appearance was that of a typical phaeochromocytoma. The left suprarenal contained a small ovoid tumour, pale yellow in colour, measuring 2½ by 1½ by 2 cm. and weighing 16 g. Microscopically it had a

similar structure to the first, and remnants of normal adrenal cortex were visible at one pole. The thyroid showed alveoli distended with pale-staining colloid. Other organs were found to be normal.—I am, etc.,

Southern Hospital, Dartford.

ALBERT FAHMY.

Social Trends and Home Confinements

SIR,—Professor Dugald Baird writes (June 7, p. 1246) that in Aberdeen the stillbirth rate was found to be 30% greater at home than in hospital, and he offers the greater safety of hospital as a reason against any increase in domiciliary midwifery. Dr. W. N. Leak has already suggested (June 21, p. 1352) that the findings in Aberdeen are not generally applicable, and we should like to draw Professor Baird's attention to the following figures, which appear to confirm Dr. Leak's view. They relate to pregnancies occurring among the inhabitants of a West Country city in 1949, 1950, and 1951, and they compare the results of delivery in hospital with those achieved in the home by the district midwives and general practitioners.

	Deliveries	Stillbirths	
		Cases	Rate per 1,000 Births
Domiciliary ..	1,484	32	21.3
Hospital ..	1,749	39	22.0
All cases ..	3,233	71	21.8

This shows little difference in the stillbirth rates, but the two series are not strictly comparable, if only because the proportion of primiparae is 24% in the home and 50% in hospital. The rates for primiparae and multiparae separately are:

	Stillbirths per 1,000 Total Births	
	Primiparae	Multiparae
Domiciliary ..	29.3	18.5
Hospital ..	23.7	20.0
All cases ..	25.5	19.1

This does indeed show a 23% higher rate among the primiparae delivered at home, but if it had been possible to admit all these primiparae to hospital the actual number of stillbirths avoided would have been only two or three, and the 365 patients involved would have needed four beds and cots for the whole of the three-year period.

It is important to know the reason for this difference in primiparous stillbirth rates before suggesting a remedy, and, if the results of forceps delivery are any criterion, it is clearly not due to the inability of the district to deal with mildly abnormal cases. The stillbirth rate after forceps delivery is virtually the same at home as in hospital:

	Primiparae Delivered	Forceps Rate		Stillbirths After Forceps	S.B. Rate per cent. After Forceps
		Cases	%		
Domiciliary ..	365	32	8.7	2	6.2
Hospital ..	875	68	7.7	4	5.8
All cases ..	1,240	100	8.0	6	6.0

The unbooked B.B.A. never mars hospital stillbirth rates, and patients who try to conceal their pregnancies are mainly a district problem. In this series 11 district primiparae had stillborn babies, and these 11 included one premature B.B.A., and a full-term B.B.A. whose mother did not announce either her pregnancy or labour until birth had taken place. Moreover, these 11 include only four babies which were over 4½ lb. (2 kg.) in weight, a much lower proportion than in the hospital series. If gross prematures and unbooked B.B.A.s are excluded from both series, the district stillbirth rate for primiparae falls far below that of the hospital:

	Primiparae Delivered	S.B.s	Gross Prems and Unbooked B.B.A.s	Remaining Stillbirths	S.B. Rate per 1,000 Births
Domiciliary ..	365	11	8	3	8.1
Hospital ..	875	21	8	13	14.7