

involvement from its members, not just passive participation in a helping process; A.A. membership is not simply a matter of *doing*. It is a matter of *being*; of being in the group, and of being in A.A. outside of the group, in ordinary everyday life. This is what is meant when people say that self-help is a way of life, and this is why A.A. requires its members to change into almost completely different people, if they are to emerge from alcoholism the A.A. way.

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Medicine and the Law

THE DOCTOR CANNOT ALWAYS TELL
Medical Examination of the "Intact" Hymen

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INTRODUCTION

ONE of us recently attended court as an expert witness for the defence in a case of alleged assault, with hymenal damage, in a young girl of 13. It was quite clear that everyone in court, including the police surgeon who had examined the girl, was convinced that she had been assaulted because her hymen did not form a complete ring. In fact the findings at examination did not prove anything either way. The girl had changed her story of what had happened, after being interviewed many times by the police. Fortunately the defendant was acquitted on the charge of assault. This is not an isolated case and we feel that the facts about the normal hymen should be more widely known.

It is a common assumption that a doctor can tell from a vaginal examination whether a woman is a virgin or whether her hymen has been torn by sexual intercourse or otherwise damaged. Evidence on the state of a woman's hymen is often requested in the Law Courts in cases of alleged sexual assault, in petitions for annulment of a marriage, or when a care and protection order is requested in the case of a young girl—the medical examiner is expected to give a firm opinion whether the hymen has ever been damaged. Where the woman is

seen within hours of an alleged assault there may be evidence of recent damage such as bleeding, bruising, or the presence of semen. However, the woman may often be seen some weeks or months later, and it may then be difficult to decide whether there has ever been any damage to the hymen. Contrary to popular belief no definite criteria have ever been established for deciding whether a woman is a virgin or not. In some women the hymen forms a firm ring inside the introitus. The hymenal opening is so small that there can be no doubt that sexual intercourse has not taken place. However, in other women the hymen is less well developed and the introitus is distensible,¹ and it is extremely difficult for the medical examiner to state with certainty whether the woman is, or is not, a virgin. In order to establish some facts on normal biological variations among women and post-pubertal girls we have undertaken a study of 28 gynaecological patients who said they had never had sexual intercourse.

PATIENTS AND METHODS

Unmarried patients attending an endocrine and a gynaecological clinic were selected. We excluded patients who had had any vaginal surgical procedure. A gynaecological history was

TABLE I—DIAGNOSES IN AND RESULTS OF EXAMINATION OF VIRGINS

Diagnosis	Examination confirms virginity?		
	Yes	No	Uncertain
Primary amenorrhœa	2	1	
Secondary amenorrhœa	2	6	1
Menorrhagia	2		
Dysmenorrhœa	1	2	
Menstrual irregularity	4		
Hirsutism	1		
Abdominal pain	2		
Breast hypoplasia			2
Perineal lump	1		
Frequency of micturition	1		
Total	16	9	3

taken, and was followed by a routine examination including a pelvic examination. The patient was asked to say so if the examination caused any discomfort at any time. The vulva and hymen were inspected; then, provided the patient did not complain, a one finger vaginal examination was performed. The size and distensibility of the introitus were assessed and bimanual palpation of the uterus and adnexæ was carried out. When possible a speculum of suitable size was inserted to examine the cervix. If vaginal examination was not possible or caused discomfort, rectal examination was performed instead. The examiner then decided if sexual intercourse *could* have occurred. After the examination the patient was asked whether she had ever had intercourse and patients were included in the survey only if they replied that they had not.

28 patients were included in this survey. Their ages ranged from 15 to 48 years with an average age of 20 years. No patient appeared distressed by either the question or the examination. The patients' diagnoses are shown in table I.

RESULTS

The findings on examination are shown in table II. Virginity was confirmed (by finding a complete hymenal ring) in only 16 of the 28 patients (60%). In 9 patients the introitus was sufficiently distensible to suggest that

TABLE II—RESULTS OF EXAMINATION OF VIRGINS

Examination confirms virginity?	No. of patients	%
Yes	16	58
No	9	31
Uncertain	3	11
Total	28	100

intercourse could have taken place. In 3 patients it was not possible to be certain whether intercourse could have taken place or not. 8 of the 28 patients were examined by both examiners. In 2 patients the second examiner disagreed with the findings of the first, and put 1 of the "virginity not confirmed" group into the "uncertain" group, and 1 of the "uncertain" group into the "not confirmed" group.

In 8 patients, who agreed after a similar examination that they had had intercourse, the examiner was able to confirm that intercourse could have occurred in every one of them.

DISCUSSION

Three possible reasons can be suggested to explain our findings. First, it is well known that there are biological variations in the appearance of the intact hymen, and some women may have a congenitally incomplete hymen. Secondly, the repeated use of vaginal tampons may cause recurrent minor trauma, sufficient to stretch the introitus. This reason could not have applied to 12 of our patients who were suffering from primary or secondary amenorrhoea.

Thirdly, the results could be disputed on the grounds that some patients did not tell the truth about previous sexual experience. It appears unlikely that all the 12 patients whose virginity could not be confirmed by examination were untruthful, as the inquiry was included during a routine gynaecological examination, and patients usually believe that such an examination can detect loss of virginity.

The results we report are merely the opinions of two experienced gynaecologists on 28 women who said they were virgins. The difference in interpreting the findings in 2 patients reinforces our view that a vaginal examination is not an infallible method for confirming or disproving virginity.

This study shows that if a woman or a girl states she is a virgin, examination will confirm an intact hymen in only a proportion of cases. If, however, examination does not demonstrate a complete hymenal ring or if this ring is distensible, then the woman's claim to virginity cannot be disputed on these grounds. Conversely, if a woman or girl alleges assault and vaginal examination demonstrates an incomplete hymenal ring, this fact does not confirm that the hymen has been damaged by attempted intercourse or some other means.

Requests for reprints should be addressed to R.A.U.

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ADDENDUM

Our findings were communicated to the President of

the Family Division of the Courts. He has now given instructions that the medical examiner in nullity cases can state that the woman has never had, or may have had, or has had, normal sexual intercourse.

Occupational Health

PSYCHIC POSSESSION AMONG INDUSTRIAL WORKERS

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INTRODUCTION

Two separate outbreaks of skin disorders appeared during the first nine months of 1976 among factory workers in a town of approximately 100 000 people in the north of England. The importance of these epidemics lies not in the symptoms or in the physical diagnoses but in the unusual aetiology.

FIRST EPIDEMIC

Early in 1976, my services as a dermatologist were sought by the medical adviser to the Employment Advisory Service of this region. During the preceding few weeks there had been a serious outbreak of a condition thought to be dermatitis among several employees in a small ceramics factory with an important export market. Most of the factory's employees were married women working part-time. The work was highly skilled and consisted of the hand painting of ceramic figures.

Ten employees were affected, eight skilled women and two unskilled men employed as porters. The eight women worked in the same room at three tables placed at a distance from each other. The management and the medical adviser were concerned that the alleged dermatitis might have been due to contact with one of the materials handled. It was known that there had been no changes in the quality or in the manufacturing processes of the raw materials used. Neither had there been any change in the painting materials for more than two years. The problem therefore was to establish whether we were dealing with an acute irritant dermatitis or a true hypersensitivity to a specific substance (contact dermatitis) in the room where the affected employees worked.

Investigation

A visit to the factory included a complete tour and a detailed examination of the room. Permission for interview and examination was sought from the employees. A very careful history was taken and each employee was examined separately and alone, except for the presence of the medical adviser.

The first employee to be affected was a woman who was not present at the initial interview. The other seven women all described how their own difficulties had begun after they had seen the red and swollen face of their colleague, the first victim, and heard her story. Each of the seven gave a clear-cut story of transient erythematous rashes on various exposed surfaces—particularly the face, the neck, the dorsum of the hands (the fingers were not involved), and the dorsal surfaces of the forearms. One or two described redness of the chest at the V of the neck, but none described a true eczematous eruption of any significant duration or persistence. The two men had a reactive eczema of the face and hands of short duration (2-3 days) attributable to the cold east wind prevalent at the time. Their condition was described as winter eczema.

A plan showing the positions of the work tables was studied.