MATTERS ARISING

An outbreak of penicillin-sensitive strain of Neisseria gonorrhoea in Sydney men

The recent article by Rowbottom et al concerning an outbreak of a penicillin sensitive strain of Neisseria gonorrhoea prompts us to report the recent emergence of a new strain of infection in the gay men attending the genitourinary medicine clinic in Edinburgh, Scotland.

In 1993 we were aware of an increase in the number of infections with serovar 1A-6 in gay men. Over the 4 year period 1990 to 1993 there were 12 cases of 4-5% (23/508) of all cases of gonorrhoea in Edinburgh. In gay men between 1990-92 1A-6 infections only accounted for 3-4% (5/147) of infections but in 1993 this increased to 21% (7/335) of homosexually or bisexually acquired infections (p = 0.02, Fishers exact test). The prevalence of 1A-6 in the heterosexual population did not alter significantly (1990-92:10/260[3.8%] cf 1993:14/41[3.4%]).

Classification of infections as homosexually acquired was based on the patients' self reported behaviour but additional confirmation was provided by the high male:female sex ratio of about 8:1 which is characteristic of infections diagnosed in women in 1993. The sites of infection were also consistent with increased homosexual acquisition with rectal or pharyngeal infections accounting for 5 of the 8 1A-6 infections in 1993 compared with 5 out of 15 1A-6 infections in 1990-92.

An association between the serovar iso- lated and sexual orientation is well recognised. 2-3 1A-1/2 infections are commonly seen in heterosexual patients whilst 1B strains are commoner in gay men.4 Thus the recent increase in incidence of infections with 1A-6 in gay men is unusual.

There are a number of possible explanations for the observed change in serovar pattern. Increased resistance to penicillin may provide a selective advantage in the gay population and serovars isolated from gay men tend to have a reduced sensitivity to penicillin.5 Although 1A strains are usually more sensitive to penicillin than 1B isolates,6 a change in penicillin sensitivity in 1A-6 strains was evident between 1990-92 and 1993 with a decrease in the proportion of isolates with an MIC of <0.5 mg/l from 93% (14/15) to 12% (1/8) (p < 0.01). Although such resistance may be an advantage where antibiotic pressure is high there is genuine concern about the poor correlation between the level of resistance to antibiotics and prevalence of a serovar possibly as a result of an associated impaired uptake of nutrients. Alternatively the sharp increase in 1A-6 infections in gay men may be a result of its chance introduction into a "high frequency transmitter" group of promiscuous individuals which might result in a brief and self limiting micro epidemic. One possible source for this strain is the Far East where 1A-6 infections are common.7 The isolation of all seven homosexual isolates in the first six months of 1993 would support this hypo-

thesis. Interestingly although all seven homosexually acquired infections were acquired locally, the one heterosexual infection in 1993 was acquired in the Far East raising the possibility that this individual was actually bisexual.

Thus, although uncommon, 1A serovar group infections can be associated with both an outbreak of homosexually acquired infection and with reduced penicillin sensitivity.


The value of primary colposcopy in genitourinary medicine

Moss and colleagues1 have reviewed their use of "primary colposcopy"—that is colposcopy used as a screening test—in a popu- lation of general practice in medicine (GUM) clinic attenders. They appear to suggest that they have demonstrated a need for such screening and even suggest that such screening would be cost effective. I would like to raise some doubts.

They report only the results of "primary colposcopy" in 1,338 women who had an "abnormal transformation zone". We are not told how many colposcopies in total were performed under this heading by the majority of which might be assumed to have been normal. It would appear that a very large number of colposcopies had been performed. Out of 15 screening cases of intraepithelial neoplasia (CIN) grade 2/3; there is no evidence that the current national screening policy would not have detected these lesions on subsequent cytol-

Moss replies.

I have read with interest correspondence from Dr. Malcolm Griffiths relating to our review of primary colposcopy.1 This paper described an extension of retrospective research which was designed to begin to answer questions arising from the association and inter-relationship between cervical dyskaryosis and/or CIN and other concomitant sexually transmitted diseases. The original work was presented to the Working Party of the National Co-ordinating Network and was vigorously debated.

There are at least two valid reasons for considering future carefully prospective primary colposcopy studies in collaboration with cytology. The first of these was advocated by the NCG Coordinating Working Party. "In young women HPV may be one of a multiplicity of sexually transmitted diseases present simultaneously and referral to a genital urinary medicine clinic should be considered."2 This seems in complete agreement with the conclusion made by Griffiths and colleagues in a study of 154 women with dyskaryotic cervical smears.2/3 "We conclude that an abnormal cervical smear is frequently a marker of concomitant lower genital tract infection."3

A second reason is that it is important to be aware of discrepancies between cytology and histology of more than 2 degrees of variation.4 In reply to Dr. Griffiths it must be asked whether the paper by Gille et al support the case he has argued. Not everyone would think so. Dr. Griffiths’ letter appears to combine two separate references.5 Surely it is not valid to arbitrarily combine papers with a different methodology and with different outcomes and then construct a “combined conclusion”.

Giles clearly stated that the importance of small lesion size was unknown, not that small lesions were unimportant. By comparing primary colposcopy small numbers of cases of high grade CIN of variable lesion size are identified where the degree of variation with colposcopy is >2 degrees.

Further, current primary colposcopy has recently identified one case showing CIN III, where high grade colposcopic changes are present throughout all four quadrants and extends onto the vaginal vault. Would anyone wish to leave such findings untreated?7 This process achieves earlier diagnosis and affords the opportunity to combine combined audit with cytology.

None of the authors of the review paper on primary colposcopy have any sceptical feelings regarding the value of cervical screening. It is only contrary, applying this technology to new female attendees in GU medicine has allowed us to understand more about the variance (inter and intra observer variation) in cervical cytology and to develop a greater understanding of cytopathology, as well as to communicate and explain in a better way to our patients and to their partners.

Griffiths speculates that very few cases of cervical cancer diagnosed in the Doncaster area have ever been GUM attenders. The current Doncaster District confidential audit of cervical cancer deaths will identify any fatal cervical cancer cases who had attended gynaecological medicine clinics (1990 onwards). This, together with 14 years of follow-up audit in a town with a relatively stable population is a very comfortable, secure clinical environment. Few colposcopists would argue against this last concept.

For a current consensus UK viewpoint on the role of genito urinary colposcopy reference is made to a forthcoming Definitive Document from the National Co-ordinating Network.8

T R MOSS

Incidence of herpes genital infection

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<thead>
<tr>
<th>Disease</th>
<th>Female</th>
<th>Male</th>
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<tbody>
<tr>
<td>Herpes simplex virus type 1</td>
<td>25 (67.6%)</td>
<td>9 (75%)</td>
</tr>
<tr>
<td>Herpes simplex virus type 2</td>
<td>12 (32.4%)</td>
<td>3 (25%)</td>
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<tr>
<td>Total</td>
<td>37</td>
<td>12</td>
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Ninety patients who had presented to the gynaecological medicine clinics at Durham and Bishop Auckland between April 1992 and April 1994 were identified using KC 60 code C10a (herpes simplex first attack). All were heterosexual and the group comprised 28 men and 62 women. All had genital swabs taken for viral culture, and these were all sent to the PHLS at Newcastle, where, based on PCR analysis using monoclonal antibodies conjugated to FITC. A result was documented in 89 case notes, of which 40 (44.9%) were negative.

The majority of positive cultures were HSV I (see table).

Participation in orogenital sex was documented in 42 cases (although there was no differentiation between active or passive involvement). In the group with HSV all 23/32 (71.9%) had participated in oral sex, compared with the HSV 2 group in which 6/12 (50%) gave this history (p = 0.296). Details concerning orogenital contact were only present in 80 sets of notes. Presence or absence of cold sores in patient or partner, or a previous history of them, was poorly documented, being recorded in less than 50% of casenotes.

Evidence from Edinburgh and London suggests that herpes simplex virus type 1 does appear to have been increasing in incidence, although previously with a continuing predominance of HSV 2 in genital lesions.1 This may be related to orogenital contact—recent figures from the nationwide survey of sexual attitudes and lifestyles in the U.K.4 show that 75.2% of men and 69.2% of women have participated in oral sex at some time, with HSV type 1 in 49.5% of women reporting this practice in the last year.

This study only looked at cases of primary genital herpes, whereas published data appear to have studied viral swabs taken from patients with primary or recurrent disease. If the incidence of HSV I is currently rising, it might be expected that the proportion of HSV I amongst cases of primary genital herpes may be increasing more noticeably.

Another clinic in the same region as our own has also reported a higher incidence of HSV 1 in women (personal communication).

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