The prevalence of gender dysphoria in Scotland: a primary care study

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SUMMARY

A questionnaire was sent to senior partners in all general practices in Scotland designed to elicit experience of patients with gender dysphoria: a subjective experience of incongruity between genital anatomy and gender identity. Responses were received from 73% of practices. The prevalence of gender dysphoria among patients aged over 15 years was calculated as 8.18 per 100 000, with an approximate sex ratio of 4:1 in favour of male-to-female patients. One-third of gender-dysphoric patients known to practices had registered in the preceding 12 months, suggesting that patients with this condition are increasingly likely to present for medical care.

Keywords: gender dysphoria; questionnaire; general practitioners.

Introduction

PIONEERING clinical work in the 1950s led to Harry Benjamin's description of the 'transsexual phenomenon' in the United States.¹ Public and professional knowledge of the condition has increased in recent years through some well-publicised legal and clinical cases.

The pathway of gender change involves considerable clinical input. Transsexual individuals may seek counselling, psychological, psychiatric, endocrinological, and dermatological services, speech therapy, and surgical services. Other patients with gender identity problems may not seek somatic treatments but might require counselling or psychological support. The implications for health services are unclear. The Scottish Needs Assessment Programme established a group to address this issue in 1997–1999. The group was multidisciplinary and included a male-to-female transsexual. Since there were no adequate data on the prevalence of gender dysphoria or transsexuality in the United Kingdom, we obtained data from Scottish general practitioners (GPs).

There are conflicting data on the prevalence of transsexuality and gender dysphoria. Although data on surgical gender reassignment exist from the Netherlands, England and Wales, Singapore, Germany, and Australia and New Zealand, we have been unable to identify publications dealing with gender identity problems in a community-based medical setting.

Methods

In April 1998, a questionnaire was sent to the senior partner of

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all general medical practices in Scotland together with a covering letter. The questionnaire sought details of the total number of patients registered with the practice and the number of patients with gender dysphoria. Gender dysphoria was defined as a subjective experience of incongruity between genital anatomy and gender identity. Transvestism was specifically excluded. Non-responders were sent a follow-up questionnaire after four weeks.

Results

A total of 784/1073 (73%) completed questionnaires were returned. The number of patients registered with the responders' practices was 4 105 872, representing 80% of the Scottish population. Assuming that the gender ratio and age structure in responding practices is the same as that for Scotland as a whole — as is suggested by the Registrar General for Scotland — we calculate that the responding practices have 3 336 261 patients aged over 15 years, among which there are 1 622 090 males and 1 714 171 females, respectively. These figures are used as denominators for prevalence calculations. The number of patients identified by responders is presented in Table 1.

A total of 273 patients with gender dysphoria were identified, representing 8.18 patients per 100 000 population aged over 15 years. Among these patients, 65 (24%) were undergoing hormonal treatment without surgery, and 95 (35%) had undergone gender reassignment surgery. Responders indicated that 85 (31%) of their patients had presented within the past 12 months. Prevalences reported by GPs responding to the first mailing were somewhat higher than those reported by responders to the reminder letter. Several responders added comments to the effect that they lacked knowledge both of the condition itself and of pathways of referral.

Discussion

The prevalence of patients undergoing hormonal or surgical treatment is of the same order of magnitude as figures reported elsewhere. Published prevalences per 100 000 population aged over 15 years are 4.72 in the Netherlands in 1996, 1.9 in England and Wales in 1974, 23.6 in Singapore in 1988, 2.25 in Germany in 1996, and 2.38 in Australia in 1996. An approximate sex ratio of 3:1 in favour of male-to-female transsexuals reported by these authors accords roughly with our findings.

The presentation of transsexual patients to GPs is relatively uncommon, and we think that such presentations are likely to be memorable. The excellent response rate to our enquiry supports this proposition. Furthermore, since GPs are responsible for almost all prescribing and for most referrals to secondary care, it is likely that the prevalence reported here includes most of the patients who have presented with gender identity problems to responding GPs. It is possible that our figures could overestimate prevalence by up to 20% if non-responders had no registered gender-dysphoric patients. On the other hand, it is likely that many gender-dysphoric patients will not yet have presented to GPs.

Over 40% of patients were not receiving hormonal treatment and had not had surgery; this may suggest that many gender-dysphoric patients are not known to secondary care services. The finding that more than one-third of cases of gender dysphoria had

Table 1. Number of cases identified by responders and calculated prevalence (per 100 000 population aged over 15 years) using a calculated denominator for the practice population of 3 336 261 (1 622 090 males, 1 714 171 females).

	Male-to- female	Female-to- male	Total (%)	Prevalence male-to-female (n = 1 622 090)	Prevalence female-to-male (n = 1 714 171)	Total prevalence (n = 3 336 261)
Patients with gender dysphoria but not in treatment	53	13	66 (24)	3.27	0.76	1.98
Patients with gender dysphoria in psychological/counselling treatment only	38	9	47 (17)	2.34	0.53	1.41
Patients taking sex hormone therapy but pre-operative	54	11	65 (24)	3.33	0.64	1.95
Post-operative transsexual patients	73	22	95 (35)	4.50	1.28	2.85
Totals	218	55	273 (100)	13.44	3.21	8.18

presented to practices within the preceding 12 months is also worthy of note. Recall bias and re-registration of known gender-dysphoric patients with new practices may explain part of the apparent phenomenon of increasing incidence. Nevertheless, the apparently increasingly frequent presentation of gender dysphoria may reflect increasing social acceptance of the condition.^{4,5} If this proves to be the case, we should expect most practices to encounter at least one patient with gender identity problems at some time.

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