

Postprint Version	1.0
Journal website	http://www.sciencedirect.com/science/journal/02779536
Pubmed link	http://www.ncbi.nlm.nih.gov/entrez/query.fcgi?db=pubmed&cmd=Retrieve&dopt=AbstractPlus&list_uids=16820254&query_hl=3&itool=pubmed_docsum
DOI	10.1016/j.socscimed.2006.05.024

* Corresponding author. Tel.: +3130 2329813; fax: +3130 2319387. E-mail addresses:
F.Bakker@rng.nl (F.C. Bakker), tgs2001@columbia.edu (T.G.M. Sandfort),
i.Vanwesenbeeck@rng.nl (I. Vanwesenbeeck), gert.westert@rivm.nl (G.P. Westert).

Do homosexual persons use health care services more frequently than heterosexual persons: Findings from a Dutch population survey

FLOOR C. BAKKER^{A,*}, THEO G.M. SANDFORT^{B,C}, INE VANWESENBEECK^A, HANNEKE VAN LINDERT^D,
GERT P. WESTERT^E

^a Research Department, Rutgers Nisso Groep, Oudenoord 176– 178, PO Box 9022, 3506 GA Utrecht, The Netherlands

^b HIV Center for Clinical and Behavioral Studies, New York State Psychiatric Institute, USA

^c Columbia University, USA

^d Netherlands Institute for Health Services Research, The Netherlands

^e National Institute of Public Health, Tilburg University, The Netherlands

ABSTRACT

Use of health care services has been suggested to be lower among homo- or bisexual persons than among heterosexual persons, due to a lack of trust in the health care system. However, population-based studies on differences in health care utilization according to sexual orientation are scarce. The purpose of the current study was to explore differences in health care utilization and confidence in health care between heterosexual, bisexual and homosexual persons. A survey of a random sample of patients of Dutch general practices (n = 9684) gathered data on socio-demographic variables, sexual orientation, health status, confidence in health care and health care utilization. Differences in health care utilization between homo- or bisexual persons and heterosexual persons were analyzed with logistic regression analysis, in which we statistically adjusted for socio-demographics and health status. Reported health was lower among homosexual men and women as compared to heterosexual persons. There were no sexual orientation-related differences in confidence in health care. Controlling for health status, it appeared that gay men more frequently used mental and somatic health care than heterosexual men, and that lesbian or bisexual women more frequently used mental health care than heterosexual women. We found a higher rate of health care use among homosexual and bisexual persons as compared to heterosexual persons, that could only be partly explained by differences in health status. To gain a better understanding of our findings, data on the predisposition to use health services among homosexual and bisexual men and women is needed.

INTRODUCTION

Use of health care services has been suggested to be lower among homo- or bisexual men and women compared to heterosexual persons. Various studies suggest that homosexual persons delay or avoid seeking care as a consequence of negative experiences with health care practitioners due to homophobia, heterosexism, or ignorance (Saulnier, 2002; Stein & Bonuck, 2001). Furthermore, a considerable portion of homo- or bisexuals do not disclose their sexual orientation to their health care providers (Carr, Scoular, Elliott, Ilett, & Meager, 1999; Eliason & Schope, 2001). Non-disclosure of sexual orientation in health care settings may prevent recognition of specific health needs by health professionals and lead to inadequate or inappropriate care (Klitzman & Greeneberg, 2002; Robertson, 1998).

Population-based studies on actual differences in health care use according to sexual orientation are scarce. In contrast to the studies cited above, a recent survey among English-speaking adults in the United States found that use of mental health services was more frequent among non-heterosexual men and women (Cochran, Sullivan, & Mays, 2003). As the authors also found a higher prevalence of mental disorders among homo- or bisexual respondents, which corresponds with the findings of several other studies (Jorm, Korten, Rodgers, Jacomb, & Christensen, 2002; Meyer, 2003; Sandfort, De Graaf, Bijl, & Schnabel, 2001), the more frequent use of health care might be due to larger care needs and does not necessarily imply that care-seeking behavior in itself differs according to sexual orientation. However, analysis on the subgroup of respondents with a mental health disorder showed the same outcome, i.e. a larger utilization of mental health care for non-heterosexual compared to heterosexual men and women, which supports the hypothesis of differences in care-seeking behavior according to sexual orientation. With regard to use of somatic health care, a population-based study of lesbian, bisexual and heterosexual women showed that, in accordance with only minor differences in the prevalence of specific medical conditions and no differences in self-perceived (somatic) health status, the proportion of women that visited a health care provider within the previous year was equal for heterosexual, bisexual and lesbian women (Diamant, Wold, Spritzer, & Gelberg, 2000). Thus, the few studies that use representative samples of the general population did not find lower use of health care among homo- or bisexual persons. Instead, a higher rate of mental health care use was found for homo- or bisexual respondents. However, the current state of knowledge is insufficient for definitive conclusions.

The purpose of the current study was to explore sexual orientation-related differences in use of health care and confidence in health care. The second Dutch National Survey of General Practice allowed us to compare representative samples of hetero-, homo- and bisexual men and women.

METHODS

Subjects

The data used for the current study originate from the Second Dutch National Survey of General Practice (DNSGP-2), carried out in 2001 in 104 general practices in the Netherlands (Westert et al., 2005). The patient population of the 104 practices consists of almost 400 000 individuals; hence one out of every 40 Dutch citizens is potentially involved in DNSGP-2. The patient population is representative of the Dutch population with regard to age, gender, and type of health insurance. Persons not listed in the registries of general practitioners (GP's), such as illegal aliens, are missed. At present, approximately 0.5 percent of the population is estimated as not being listed at a GP. The current study is based on the data collected by means of a health interview survey on a random sample of the Dutch-speaking patients of the 195 GPs. Patients were invited to participate in the survey via announcements in the practice and a personal letter by their GP. The response rate was high (64.5 percent) and the distribution of the respondents according to age, gender, education and place of residence is comparable with the sample population. With respect to ethnicity of the respondents the non-indigenous population is underrepresented: 12.5 percent in the response group versus 17.5 in the Dutch population. Item non-response was extremely low because the interview data were collected by 160 trained interviewers at the homes of the respondents using computer-assisted personal interviewing (CAPI, the computer was handled by the interviewer).

According to Dutch legislation it was not necessary to obtain informed consent from the participants due to the non-experimental nature of the study. However, the study was carried out in accordance with the Dutch legislation on privacy and approved by the Dutch Data Protection Authority. The GP's did not receive any information resulting from the interviews with their clients. For further information on the design of the study, see Westert and colleagues (2005).

Measuring instruments

Socio-demographic variables assessed in the study were gender, age, level of education, level of income, and urbanization degree of residence.

Sexual orientation was assessed with one question asking about the participants' sexual preference (i.e. only women, mainly women, both women and men, mainly men, only men). This question was only asked of respondents of 18 years and older. A card was used, on which the five categories were written and numbered. Respondents had to read out the number corresponding to their answer. Exclusive or predominant attraction to the same and the other sex was categorized as homosexual and heterosexual, respectively. Respondents with attraction to both women and men were categorized as bisexual.

Physical health was assessed with a checklist, covering acute somatic complaints or diseases in the past 2 months (influenza/inflammation of the throat/sinusitis, bronchitis, inflammation of the ear, nephritis/cystitis, diarrhea, vomiting, gastric ulcer) and chronic somatic diseases (diabetes, cerebral infarct or hemorrhage, cardiac infarct/other serious heart disease, cancer, migraine, high blood pressure, stricture of blood vessels in stomach or legs, asthma/chronic bronchitis/CNSLAD/lung-emphysema, psoriasis, chronic eczema, dizziness with falling, serious intestinal disease, incontinence, serious back problems, chronic arthritis, other chronic diseases). We determined the proportions of respondents with one or more acute physical symptoms and one or more chronic conditions. Subjects' self-rated health status was measured using the 5-point global assessment scale (one item), of the Short-Form-36 Health Survey (SF-36) (Aaronson et al., 1998). We determined the proportions of respondents with "fair" or "poor" health status.

Mental health was assessed by means of the General Health Questionnaire (GHQ-12), a self-administered questionnaire that is used to identify people likely to have mental problems (Goldberg, 1972). Cut-off point ≥ 2 was used (Hoeymans, Garssen, Westert, & Verhaak, 2004). In addition, respondents were asked whether they had had, once in their lifetime or during the past year, an episode of severe anxiety or depression that lasted for at least 2 weeks.

Confidence in health care providers was assessed by means of a 4-point scale for degree of confidence. We determined the proportions of respondents that had little or very little confidence in health care providers.

Use of health care was independently assessed for somatic and mental health care. Respondents were asked about mental health care consultations (psychologist, psychiatrist, psychotherapist, social worker, clinic for alcohol and drug abuse, or any other mental health care professional) during the past year and lifetime, general practitioners during the past 2 months and the past year, medical specialists during the past 2 months and the past year, and paramedics during the past year. Finally, we asked the respondents about their use of prescribed or non-prescribed medicine during the past month and the past year.

Statistical analysis

All analyses were done separately for male and female persons. Bisexual and homosexual persons were independently compared with heterosexual persons on age (univariate ANOVA with Bonferroni post-hoc test), level of education and income, and urbanicity (χ^2 tests, including analysis of adjusted standardized residuals). Differences between hetero-, homo- and bisexual respondents in physical and mental health and in confidence in health care were analyzed with logistic regression analysis, in which we corrected for age, level of education and income, and urbanicity. Differences in use of somatic and mental health care between the sexual orientation groups were analyzed with logistic regression analysis, in which we corrected for the socio-demographic variables but also for physical health status (regarding regression analyses on use of medicine and consultation with general practitioner, medical specialist, paramedics and mental health care professional) and mental health status (regarding regression analyses on use of medicine and consultation with general practitioner and

mental health care professional). The predictor and outcome variables were constructed as described in the previous paragraph. For both homosexual and bisexual respondents, the heterosexual respondents were the reference group. Two-tailed p -values less than or equal to 0.05 were considered to reflect a statistically significant result.

RESULTS

For 98.2% of the participants 18 years and older it was possible to establish their sexual orientation ($n = 9511$). Of the male respondents, 1.5% was categorized as homosexual and 0.6% as bisexual. Of the female respondents, 1.5% was categorized as homosexual and 1.2% as bisexual. A bisexual orientation was more frequent among women compared to men ($\chi^2 = 10.25, p < .01$). Mean age was similar between heterosexual and gay men, but higher among bisexual men (Table 1). A larger proportion of gay men were highly educated, compared to hetero- and bisexual men. Relatively more gay men lived in areas with higher degrees of urbanicity. Socio-economic status, as measured by level of income, was also higher for gay men. Differences in mean age of hetero-, bisexual and lesbian women were not significant. Levels of educational, income, and urbanicity were relatively high among lesbian and bisexual women, compared to heterosexual women.

[TABLE 1]

Proportions of participants with at least one acute physical complaint in the past 2 months did not differ between homo- or bisexual persons and heterosexual persons (Tables 2 and 3). However, the proportion of persons with 1 or more chronic diseases was higher among homosexual men and women than among heterosexual respondents. Consistent with this, a relatively high proportion of gay men and lesbian women rated their (somatic) health status as fair or poor. Two gay men and one heterosexual woman reported a HIV-infection. The prevalence of chronic diseases was low among bisexual men compared to heterosexual men.

[TABLE 2]

[TABLE 3]

Reported mental health of gay men and lesbian women was worse than that of heterosexual men and women. A relatively large proportion of gay men and lesbian women had a score of ≥ 2 on the GHQ, and had had an episode of at least 2 weeks during the preceding year in which they were very anxious or depressed. For gay men, the life span prevalence of these episodes was also relatively high. Mental health status of bisexual and heterosexual persons did not differ significantly.

Homosexual and bisexual respondents had just as much confidence in health care and health care professionals as heterosexual respondents (Tables 2 and 3). The scale for health care confidence, composed out of the six single item measures, proved to be a reliable measure (Cronbach's α , 0.70). Mean scale scores did not differ between heterosexual, gay or bisexual men (respectively, 2.8, 2.7 and 2.9), nor between heterosexual, lesbian or bisexual women (respectively, 2.8, 2.7 and 2.8).

Controlling for health status, the following differences in health care use appeared between homo- or bisexual persons and heterosexual persons. A larger proportion of gay men than heterosexual men had consulted a general practitioner and a medical specialist in the past year. Also, a larger proportion of gay men had consulted a mental health care professional at least once in their lifetime. Medicine use was also relatively high among gay men. Excluding the two gay men with HIV-infection did not change the results: the differences in use of health care services between heterosexual and gay men remained the same. No differences in use of health care appeared between bi- and heterosexual men.

For women, there were no significant differences in mental health care and medicine use. A larger proportion of lesbian women than heterosexual women had consulted a mental health care professional, both in the past year and during their lifetime. Non-prescribed medicine use, however, was lower among lesbian than among heterosexual women. Bisexual women also made relatively more use of health care than heterosexual women: a larger proportion of bisexual women had consulted a general practitioner in the past 2 months, and a mental health care professional in the past year. Although the proportion of persons using medicine in the preceding year was similar between bi-

and heterosexual women, relatively more bisexual than heterosexual women took prescribed medicine in the past month.

DISCUSSION

In this population-based study, we examined sexual orientation-related differences in use of health care. Taking differences in physical and mental health status into account, we found that gay men had more frequently used mental and somatic health care compared to heterosexual men, and that lesbian or bisexual women more frequently used mental health care than heterosexual women. There were no orientation-related differences in confidence in the health care system or the health care professionals.

There is a paucity of literature on relative rate of health care use among homo- or bisexual men and women. Some studies show that gay men and lesbian women may avoid or delay seeking health care because of (anticipated) negative experiences or dissatisfaction with health care (Saulnier, 2002; Stein & Bonuck, 2001). Other studies indicate that homosexual men and women actively search for gay-friendly physicians (Barbara, Quandt, Anderson, 2001; Beehler, 2001). A large study in England and Wales found that gay men and lesbians were more likely than heterosexuals to have consulted a mental health professional in the past (King et al., 2003). However, none of the cited studies were based on random general population-based samples, which brings into question the generalizability of these findings to the larger gay and lesbian population. A recent general population study demonstrated, in accordance with the findings of the current study, higher rates of mental health care use for non-heterosexual men and women (Cochran et al., 2003). With regard to somatic health care, we found a significantly larger utilization for gay men, but not for lesbian or bisexual women. On the basis of the current study, it is not possible to explain this discrepancy.

Confidence in health care professionals, which is one of the determinants of health care use (Andersen, 1995; Giacalone, 2000), was found to be equal between homo-, bi- and heterosexual persons. Again, there is a lack of population-based studies that compare confidence in health care according to sexual orientation, but the available reports in the literature indicate dissatisfaction and discomfort with health care providers in substantial proportions of homo- or bisexual men and women (Avery, Hellman, & Sudderth, 2001; Barbara et al., 2001). These reports are based on studies in the United States. The absence of orientation-related differences in confidence in health care found in the current study might be related to the relative tolerant social climate toward homosexuality in the Netherlands, compared to other Western countries (Widmer, Treas, & Newcomb, 1998). To the extent that the level of social acceptance of homosexuality induces gay-positive health care, one could expect differences in confidence in or satisfaction with health care between countries. A Dutch study using convenience samples of gay men and lesbian women found that gay men were just as satisfied about their general practitioner and psychosocial caregiver as heterosexual men. Lesbian women were just as satisfied about their general practitioner, but less satisfied about their psychosocial caregiver, as compared to heterosexual women (Bos, Dietz, Oudheusden, & Sandfort, 1999). Research among Dutch gays and lesbians of 55 years and older found that the majority of them have no negative experiences relating to their sexual orientation with caregivers such as the general practitioner or a psychosocial worker (Van de Meerendonk, Adriaansen, & Vanwesenbeeck, 2003).

How could the higher rate of health care use among gay men, and lesbian or bisexual women be understood? As far as possible, we controlled for the impact of health status on health care use. Therefore, it is unlikely that the differences in the use of health services are caused by differences in physical or mental health. According to the Behavioral model of health services use (Andersen, 1995; Andersen & Newman, 1973), people's use of health services is a function of their predisposition to use services, factors that enable or impede use, and their need for care. Need for care is largely determined by (perceived) health status. Impediments for care use, such as being uninsured for health care or having insufficient transport to health services, are limited thanks to the Dutch infrastructure and social- insurance system (Van Ewijk & Kelder, 1999). The explanation for the higher rate of health care use among non-heterosexual persons may lie in the first factor of the model, i.e. someone's predisposition to use services. Social factors such as the quality of one's social network, personality characteristics such as coping style, and health beliefs are major determinants for someone's predisposition to use health services. To gain a better understanding of the findings of the current

study, data on the predisposition to use health services of homosexual and bisexual men and women is needed.

A limitation of our study is that only sexual preference was assessed. Some of the respondents that report same-sex preference may lack other indicators of a homosexual orientation such as having a same-sex partner or identifying as a homosexual. Although we did not do so due to space considerations, using more than one index of homo- and bisexuality is preferable. Another limitation is the low number of male bisexual respondents, which affects the power of the study to detect existing differences between bi- and heterosexual men. Visual inspection of the data, however, did not show higher use of health care among bisexual men as compared to heterosexual men, with the exception of a somewhat larger proportion of bisexual men that consulted a mental health care professional at least once in their life. The majority of studies in this area did not include bisexual persons at all, or did not separately analyze the data on bisexual persons.

We conclude that use of health care services is higher among gay men and bisexual or lesbian women compared to heterosexual men and women. Our study strongly suggests that this higher rate of health care use is at least partly related to differences in care-seeking behavior, and not only to lower health status of homosexual or bisexual men and women.

ACKNOWLEDGMENTS

The overall study was mainly financed directly or indirectly by the Dutch Ministry of Health, Welfare, and Sports. In addition, the Stichting Centraal Fonds RVVZ contributed financially to the study. Data-analyses and report writing were supported by an additional grant from the Dutch Ministry of Health, Welfare, and Sports to the Rutgers Nisso Group.

TABLES

Table 1
 Demographic and SES characteristics by gender and sexual orientation

	Men			F/χ^2	Women			F/χ^2
	Heterosexual (n = 4140)	Bisexual (n = 25)	Homosexual (n = 64)		Heterosexual (n = 5138)	Bisexual (n = 65)	Homosexual (n = 79)	
<i>Sexual preference (%)</i>								
Exclusively women	96.3	0.0	0.0		0.0	0.0	77.2	
Predominantly women	3.7	0.0	0.0		0.0	0.0	22.8	
Women and men equally	0.0	100.0	0.0		0.0	100.0	0.0	
Predominantly men	0.0	0.0	18.8		7.9	0.0	0.0	
Exclusively men	0.0	0.0	81.3		92.1	0.0	0.0	
<i>Mean age, years (sd)</i>	48.6 (16.7)	57.2 (19.9) ^a	45.7 (15.8)	4.3*	49.0 (17.1)	53.5 (19.9)	49.9 (19.8)	2.3
<i>Educational level (%)</i>								
Primary, basic vocational	32.9	32.0	23.8	18.0**	37.0	32.3	34.2	22.3***
Lower secondary	36.2	28.0	25.4		36.4	29.2	24.1 ^a	
Higher secondary	7.2	16.0	6.3		7.8	4.6	7.6	
Higher professional, University	23.7	24.0	44.4 ^a		18.8	33.8 ^a	34.2 ^a	
<i>Urbanicity (%)</i>								
Lowest	19.0	28.0	6.3 ^a	44.0***	18.6	18.5	17.7	27.6***
Lower	26.9	4.0 ^a	14.1 ^a		25.6	15.4	17.7	
Medium	20.5	20.0	15.6		20.1	7.7 ^a	15.2	
Higher	18.3	28.0	23.4		19.4	29.2 ^a	20.3	
Highest	15.4	20.0	40.6 ^a		16.3	29.2 ^a	29.1 ^a	
<i>Income (%)</i>								
Lowest	16.0	13.0	6.3 ^a	23.1**	18.0	16.9	10.5	29.5***
Lower	18.3	26.1	28.6 ^a		24.0	25.4	34.2 ^a	
Medium	17.5	17.4	4.8 ^a		15.4	6.8	9.2	
Higher	16.6	13.0	9.5		15.7	11.9	2.6 ^a	
Highest	31.5	30.4	50.8 ^a		26.9	39.0 ^a	43.4 ^a	

^aSignificantly different from value in heterosexuals; * $p \leq 0.05$; ** $p \leq 0.01$; *** $p \leq 0.001$.

Table 2
 Physical and mental health, confidence in health care, and use of health care in men by sexual orientation

	Heterosexual (n = 4140)	Bisexual (n = 25)	Adjusted OR (95% CI) ^a	Homosexual (n = 64)	Adjusted OR (95% CI) ^a
<i>Physical health (%)^b</i>					
Positive for at least 1 acute complaint/ disease, past 2 months	40.8	32.0	0.85 (0.35–2.02)	43.8	1.04 (0.62–1.74)
Positive for at least 1 chronic disease	59.1	40.0	0.23 (0.09–0.56)***	70.3	1.86 (1.06–3.28)*
Rates own health as “fair” or “poor”	16.1	20.8	0.96 (0.31–2.94)	26.6	2.37 (1.29–4.35)**
<i>Mental health (%)^b</i>					
GHQ score \geq 2	18.9	16.0	0.93 (0.31–2.78)	37.5	2.22 (1.31–3.77)**
Very anxious or depressed, past 12 months	11.4	12.0	1.25 (0.37–4.26)	31.3	3.56 (2.04–6.22)***
Very anxious or depressed, ever	35.0	29.2	0.84 (0.34–2.09)	64.1	3.24 (1.91–5.48)***
<i>Proportion with (very) little confidence in (%)^b</i>					
General practitioner	13.6	12.5	1.10 (0.32–3.76)	19.4	1.25 (0.64–2.44)
Nurses	7.3	8.3	1.29 (0.30–5.59)	8.2	0.95 (0.37–2.39)
Medical specialist	9.9	16.7	2.04 (0.68–6.10)	16.4	1.57 (0.79–3.15)
Mental health care	53.9	60.0	1.29 (0.50–3.35)	56.1	1.02 (0.59–1.77)
Home care	29.1	9.5	0.26 (0.06–1.12)	34.6	1.16 (0.65–2.08)
Nursing home	39.3	40.9	0.99 (0.40–2.45)	43.1	0.98 (0.55–1.72)
<i>Consults with health care professionals^c</i>					
General practitioner (%)					
Consult in past 2 months	35.5	28.0	0.52 (0.18–1.50)	48.4	1.29 (0.75–2.23)
Consult in past 12 months	71.4	68.0	0.74 (0.30–1.86)	87.5	2.32 (1.06–5.08)*
Medical specialist (psychiatrist not included) (%)					
Consult in past 2 months	18.4	20.0	1.49 (0.52–4.29)	29.7	1.63 (0.89–2.96)
Consult in past 12 months	37.2	37.5	0.78 (0.29–2.06)	55.0	2.17 (1.22–3.84)**
Paramedics (%)					
Consult in past 12 months	19.9	12.0	0.82 (0.24–2.88)	23.4	0.99 (0.54–1.82)
Mental health care professional (psychiatrist included) (%)					
Consult in past 12 months	4.5	4.0	1.10 (0.14–8.94)	15.6	1.60 (0.70–3.63)
Consult ever	16.8	24.0	2.37 (0.83–6.75)	50.0	2.64 (1.49–4.69)***
<i>Use of medicine^c</i>					
Prescribed medicine (%)					
Past month	44.8	40.0	0.97 (0.37–2.55)	57.8	1.46 (0.79–2.69)
Past 12 months	62.7	52.0	0.69 (0.27–1.73)	81.3	2.31 (1.15–4.66)*
Non-prescribed medicine (%)					
Past month	35.9	24.0	0.76 (0.29–2.01)	57.8	1.77 (1.05–3.01)*
Past 12 months	63.7	44.0	0.59 (0.25–1.43)	78.1	1.44 (0.77–2.68)

^aOR = odds ratio; CI = confidence interval.

^bOR is corrected for demographics.

^cOR is corrected for demographics and health status; * $p \leq 0.05$; ** $p \leq 0.01$; *** $p \leq 0.001$.

Table 3
 Physical and mental health, confidence in health care, and use of health care in women by sexual orientation

	Heterosexual (n = 5138)	Bisexual (n = 65)	Adjusted OR (95% CI) ^a	Homosexual (n = 79)	Adjusted OR (95% CI) ^a
<i>Physical health (%)^b</i>					
Positive for at least 1 acute complaint/ disease, past 2 months	44.7	40.0	0.96 (0.56–1.63)	44.3	0.98 (0.62–1.56)
Positive for at least 1 chronic disease	69.9	75.4	1.21 (0.65–2.27)	79.7	1.88 (1.05–3.37)*
Rates own health as “fair” or “poor”	20.2	26.2	1.42 (0.78–2.59)	31.6	2.16 (1.29–3.61)**
<i>Mental health (%)^b</i>					
GHQ score ≥ 2	25.3	35.4	1.64 (0.95–2.83)	38.0	1.79 (1.12–2.87)*
Very anxious or depressed, past 12 months	19.0	21.5	1.33 (0.71–2.49)	29.1	1.78 (1.07–2.96)*
Very anxious or depressed, ever	49.5	56.9	1.53 (0.90–2.58)	55.7	1.31 (0.83–2.08)
<i>Proportion with (very) little confidence in ... (%)^b</i>					
General practitioner	15.3	12.5	0.84 (0.39–1.78)	20.5	1.40 (0.80–2.46)
Nurses	9.9	14.5	1.43 (0.67–3.06)	15.6	1.67 (0.89–3.13)
Medical specialist	12.5	17.2	1.38 (0.69–2.75)	15.8	1.28 (0.68–2.40)
Mental health care	56.5	52.6	0.70 (0.40–1.23)	65.7	1.32 (0.79–2.21)
Home care	30.9	23.6	0.57 (0.29–1.10)	31.9	0.94 (0.56–1.57)
Nursing home	44.5	54.1	1.29 (0.75–2.24)	51.4	1.07 (0.66–1.74)
<i>Consults with health care professionals^c</i>					
General practitioner (%)					
Consult in past 2 months	46.5	73.8	2.98 (1.64–5.41)***	50.6	1.02 (0.63–1.64)
Consult in past 12 months	82.3	89.2	1.71 (0.72–4.07)	84.8	1.02 (0.52–1.98)
Medical specialist (psychiatrist not included) (%)					
Consult in past 2 months	21.3	32.3	1.66 (0.94–2.92)	24.1	0.85 (0.48–1.48)
Consult in past 12 months	42.8	54.0	1.17 (0.67–2.03)	50.6	1.02 (0.63–1.66)
Paramedics (%)					
Consult in past 12 months	27.1	35.4	1.33 (0.76–2.32)	31.6	1.04 (0.63–1.71)
Mental health care professional (psychiatrist included) (%)					
Consult in past 12 months	7.5	16.9	2.32 (1.07–5.05)*	19.0	2.06 (1.07–3.98)*
Consult ever	24.0	36.9	1.55 (0.84–2.87)	41.8	1.96 (1.16–3.32)*
<i>Use of medicine^c</i>					
Prescribed medicine (%)					
Past month	52.3	72.3	1.91 (1.00–3.64)*	67.1	1.64 (0.93–2.91)
Past 12 months	71.1	83.1	1.69 (0.81–3.50)	84.8	1.84 (0.94–3.61)
Non-prescribed medicine (%)					
Past month	52.4	44.6	0.67 (0.39–1.15)	43.0	0.59 (0.37–0.95)*
Past 12 months	78.0	69.2	0.65 (0.36–1.19)	69.6	0.57 (0.33–0.97)*

^aOR = odds ratio; CI = confidence interval.

^bOR is corrected for demographics.

^cOR is corrected for demographics and health status; * $p \leq 0.05$; ** $p \leq 0.01$; *** $p \leq 0.001$.

REFERENCES

- Aaronson, N. K., Muller, M., Cohen, P. D. A., Essink-Bot, M. L., Fekkes, M., Sanderman, R., et al. (1998). Translation, validation, and norming of the Dutch language version of the SF-36 health survey in community and chronic disease populations. *Journal of Clinical Epidemiology*, 51, 1055–1068.
- Andersen, R. M. (1995). Revisiting the behavioral model and access to medical care: Does it matter? *Journal of Health Society Behaviour*, 36, 1–10.
- Andersen, R. M., & Newman, J. F. (1973). Societal and individual determinants of medical care utilization in the United States. *Milbank Q*, 51, 95–124.
- Avery, A. M., Hellman, R. E., & Sudderth, L. K. (2001). Satisfaction with mental health services among sexual minorities with major mental illness. *American Journal of Public Health*, 91, 990–991.
- Barbara, A. M., Quandt, S. A., & Anderson, R. T. (2001). Experiences of lesbians in the health care environment. *Women Health*, 34, 45–62.
- Beehler, G. P. (2001). Confronting the culture of medicine: Gay men’s experiences with primary care physicians. *Journal of Gay and Lesbian Medical Association*, 5, 135–141.
- Bos, H. M. W., Dietz, I., Oudheusden, M., & Sandfort, Th. G. M. (1999). Psychosociale problemen bij homoseksuele mannen en lesbische vrouwen: een vergelijking met heteroseksuelen [psychosocial problems in homosexual men and lesbian women: A comparison with heterosexuals]. *Tijdschrift voor Seksuologie*, 23, 84–90.

- Carr, S. V., Scoular, A., Elliott, L., Ilett, R., & Meager, M. (1999). A community based lesbian sexual health service: Clinically justified or politically correct? *British Journal of Family Planning*, 25, 93–95.
- Cochran, S. D., Sullivan, J. G., & Mays, V. M. (2003). Prevalence of mental disorders, psychological distress, and mental health services use among lesbian, gay, and bisexual adults in the United States. *Journal of Consulting and Clinical Psychology*, 71(1), 53–61.
- Diamant, A. L., Wold, C., Spritzer, K., & Gelberg, L. (2000). Health behaviors, health status, and access to and use of health care. A population-based study of lesbian, bisexual, and heterosexual women. *Archives of Family Medicine*, 9, 1043–1051.
- Eliason, M. J., & Schope, R. (2001). Does “Don’t ask don’t tell” apply to health care? Lesbian, gay, and bisexual people’s disclosure to health care providers. *Journal Gay and Lesbian Medical Association*, 5, 125–134.
- Giacalone, K. (2000). Older lesbians’ use of professional mental health services. Dissertation abstract. *Humanities and Social Sciences*, 61(3-A), 1163.
- Goldberg, D. P. (1972). *The detection of psychiatric illness by questionnaire*. London: Oxford University Press.
- Hoeymans, N., Garssen, A. A., Westert, G. P., & Verhaak, P. F. M. (2004). Measuring mental health of the Dutch population: A comparison of the GHQ-12 and the MHI-5. *Health and Quality of Life Outcomes*, 2, 23.
- Jorm, A. F., Korten, A. E., Rodgers, B., Jacomb, P. A., & Christensen, H. (2002). Sexual orientation and mental health: Results from a community survey of young and middle-aged adults. *British Journal of Psychiatry*, 180(5), 423–427.
- King, M., McKeown, E., Warner, J., Ramsay, A., Johnson, K., Cort, C., et al. (2003). Mental health and quality of life of gay men and lesbians in England and Wales. *British Journal of Psychiatry*, 183, 552–558.
- Klitzman, R. L., & Greeneberg, J. D. (2002). Patterns of communication between gay and lesbian patients and their health care providers. *Journal of Homosexuality*, 42(4), 65–75.
- Meyer, I. H. (2003). Prejudice, social stress, and mental health in lesbian, gay, and bisexual populations: Conceptual issues and research evidence. *Psychology Bulletin*, 129, 674–697.
- Robertson, A. E. (1998). The mental health experiences of gay men: A research study exploring gay men’s health needs. *Journal of Psychiatry and Mental Health Nursing*, 5, 33–40.
- Sandfort, T. G. M., De Graaf, R., Bijl, R. V., & Schnabel, P. (2001). Same-sex sexual behavior and psychiatric disorders. Findings from the Netherlands mental health survey and incidence study (NEMESIS). *Archives of General Psychiatry*, 58(1), 85–91.
- Saulnier, C. F. (2002). Deciding who to see: Lesbians discuss their preferences in health and mental health care providers. *Social Work*, 47, 355–365.
- Stein, G. L., & Bonuck, K. A. (2001). Physician– patient relationships among the lesbian and gay community. *Journal of Gay and Lesbian Medical Association*, 5, 87–93.
- Van de Meerendonk, B., Adriaansen, R., & Vanwesenbeeck, I. (2003). *Zorgbehoeften van en zorgverlening aan lesbische en homoseksuele ouderen in Nederland*. Rutgers Nisso Groep/Schorestichting.
- Van Ewijk, H., & Kelder, T. (1999). Who cares? An overview of the Dutch systems of health care and welfare. Netherlands Institute of Care and Welfare (NIZW).
- Westert, G. P., Schellevis, F. G., De Bakker, D. H., Groenewegen, P. P., Bensing, J. M., & Van der Zee, J. (2005). Monitoring health inequalities through general practice: The Second Dutch National Survey of General Practice. *European Journal Public Health*, 15(1), 59–65.
- Widmer, E. D., Treas, J., & Newcomb, R. (1998). Attitudes toward nonmarital sex in 24 countries. *Journal of Sex Research*, 35, 349–358.