

Gold Coast general practitioners' recommendations of health websites to their patients

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The Internet is changing the traditional doctor–patient relationship.¹ Increasingly, rather than provide information directly to patients, the doctor assists them with health decisions by recommending particular health information websites¹ — these recommendations can be thought of as “Internet prescriptions”.¹ Doctors have adopted recommending or prescribing health websites to educate their patients about particular conditions or diseases, or to help patients cope with their medical conditions.¹

Many general practitioners are reluctant to recommend websites to patients,² as they remain sceptical about the advantages of using the Internet more actively and are concerned that their patients may turn to websites for information instead of consulting a health professional about potentially serious health conditions.³ Some doctors who are willing to recommend health websites to patients would only do so if the websites are guaranteed to contain quality content,⁴ but many doctors do not have the time or technical expertise for this analysis.⁵ GPs frequently express concerns about the validity and accuracy of health information found on the Internet.¹

METHODS

A survey instrument consisting of 17 questions was mailed to 250 of the 410 GPs (61%) practising on Queensland's Gold Coast. Participants were randomly chosen from an online telephone directory (<http://www.yellowpages.com.au>) and the survey was conducted between 9 October and 11 December 2006. The questions were designed to measure the proportions (0%, 1%–20%, 21%–40%, 41%–60%, 61%–80%, over 80%) of patients and websites associated with GPs' website recommendations. Data were analysed using SPSS software (SPSS Inc, Chicago, Ill, USA). Ethics approval for the study was obtained from the Griffith University Human Research Ethics Committee.

RESULTS

Of the 250 GPs contacted, 108 (43%) returned a completed survey; 72 (67%) were male and 36 (33%) female. The major-

ABSTRACT

Objective: To identify trends associated with health website recommendations by selected general practitioners to their patients.

Design and setting: Quantitative data collection using a prepaid postal survey, consisting of 17 questions, mailed to 250 of 410 GPs (61%) on the Gold Coast, Queensland. The survey was conducted between 9 October and 11 December 2006.

Main outcome measures: GPs' website recommendations to patients; associated GP demographic variables (age, sex and years of practice).

Results: 59% (64/108) of participating GPs recommend health websites to their patients during consultations. Male GPs (63%, 45/72), those aged 41–50 years (55%, 35/64), and those practising for < 10 years (60%, 12/20) are more inclined to recommend a health website to a patient. The majority of GPs (69%, 44/64) reported that they most often recommended websites to patients 26–45 years old. 53% of GPs (34/64) recommended websites to 1%–20% of their male patients, while 47% (30/64) recommended websites to 21%–40% of their female patients. A greater proportion of participating female GPs (47%, 17/36) do not recommend health websites, compared with male GPs (38%, 27/72).

Conclusions: More than half the surveyed GPs actively recommend websites to their patients, with a GP's sex, age and years of experience influencing his or her recommendation decisions. Web-based continuing medical education courses or programs in medical schools may help doctors develop the skills necessary for the delivery of effective e-health care.

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ity of participating GPs were aged 41–50 years (38%, 41/108), and 81% (88/108) had been practising for 10 or more years.

Findings of GPs who do recommend websites

Fifty-nine per cent (64/108) of the surveyed GPs reported recommending health websites to their patients during consultations. Of the male GPs, 63% (45/72) indicated that they actively recommend websites, compared with 53% (19/36) of female GPs. The majority of GPs (55%, 35/64) who recommend websites were 41–50 years old, compared with 31% (20/64) of GPs aged 51–60 years. Sixty per cent (12/20) of GPs with < 10 years experience reported recommending websites. The top four reasons why surveyed GPs recommend health websites are presented in Box 1.

Thirty-four of the 64 GPs (53%) indicated that they recommend websites to 1%–20% of their patients. The majority of GPs (69%, 44/64) reported that they most often recommend websites to patients aged 26–45 years. Furthermore, the majority of GPs indicated that they recommend websites to 1%–20% of their male patients (53%, 34/64), and 21%–

40% of their female patients (47%, 30/64). The top four health issues for which GPs recommend websites are presented in Box 1.

Forty-seven of the 64 GPs (73%) indicated that 1%–20% of their patients asked them to recommend websites. Similarly, 51 GPs (80%) indicated that 1%–20% of their patients brought online health information to them for discussion; this was most often patients aged 26–45 years (59%, 38/64). Forty-nine GPs (77%) indicated that 1%–20% of their male patients brought online health information to them, while 47 (73%) indicated the same proportion for female patients. Twelve GPs (18%) indicated that 21%–40% of their female patients brought online health information to them, while two (3%) reported that more than 40% of their female patients did this. The top four issues for which patients brought health website information to GPs for discussion are presented in Box 1.

Findings of GPs who do not recommend websites

Forty-one per cent (44/108) of the surveyed GPs indicated that they do not recommend websites to their patients. Thirty-eight per

cent (27/72) of male GPs do not recommend websites, compared with 47% (17/36) of female GPs. Fifty-two per cent (23/44) of GPs who do not recommend websites are over 60 years of age. Forty-one per cent (36/88) of the GPs practising for 10 years or more do not recommend websites, compared with 40% (8/20) of GPs with <10 years experience. The top four reasons why surveyed GPs do not recommend health websites are presented in Box 2.

DISCUSSION

The large amount of health information available on the Internet is changing, and some may say “challenging”, the traditional doctor–patient relationship.³ The new trend is to empower the patient — a move away from the older paternalistic relationship to one more patient-centric.⁶ I found that GPs recommend health websites primarily to educate the health consumer about specific diseases, drugs and health care delivery. Consumers want education and prevention information, to help them take care of themselves and participate in health discussions with their doctor in a more informed way.⁷

Many older people view computer technology with a degree of uncertainty and apprehension, resulting in many “pockets” within professions being reluctant or slow to adopt innovative approaches to emerging technologies.¹ This trend, displayed by GPs in this survey, is reflective of a younger generation that has been immersed in such technologies as the Internet for many years. One of the reasons progress in addressing this issue has been slow is the lack of understanding of how to design, implement, and evaluate health websites that impart trust to health consumers and GPs.⁸

A study on the “gender gap” in Internet use revealed that females tended to be more anxious about Internet use than males,⁹ and this was demonstrated by the female GPs in my survey. This “resistance profile” warrants further study to develop strategies that will encourage female GPs to adopt innovative technologies. Interestingly however, my research also found that female patients are more inclined than male patients to bring online health information to their GPs for discussion.

With the increasing interest in Internet use and website recommendations in health

1 General practitioners who do recommend websites (n = 64)

	No.	%
Reason for recommending		
Helps to educate patient	40	63%
Enhances the doctor–patient relationship	17	26%
Age-appropriate technology*	4	6%
Treatment orientated†	3	5%
Issues for which GPs recommend health websites to patients		
Specific diseases	33	51%
Prevention of disease	10	16%
Diet and food intake	8	12%
Alternative medicine	3	4%
Issues for which the patient brought health website information for discussion		
Specific diseases	41	64%
Alternative medicine	7	11%
Pharmaceutical drug treatment	5	8%
Prevention of disease	4	6%

* The GP perceives that the patient has access to and can use computer technology and the Internet. † A website recommendation complements the GP's specific medical treatment for the patient. ◆

2 General practitioners who do not recommend websites (n = 44)

	No.	%
Reason for not recommending		
Limited time to view websites	23	52%
Prefer to personally discuss	11	25%
Reliability issues	5	11%
Biased information	2	5%

care, many health professionals would be willing to take certified web-based continuing medical education courses.⁶ Similarly, the inclusion of programs and curricula in medical schools is a possible strategy for preparing future GPs for Internet prescribing.² These are important initiatives towards creating a more reliable and safer e-health care environment for all.

This study is the first exploration of GPs' views of Internet prescribing in Australia and may help guide future research and policy, to help doctors develop the skills necessary for the delivery of effective e-health care.

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COMPETING INTERESTS

None identified.

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