BRIEF REPORT

General Internist Communication about Sexual Function with Cancer Survivors

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BACKGROUND: Sexual dysfunction is an important issue that affects many cancer survivors who are increasingly being cared for by internists.

OBJECTIVE: To examine the attitudes and reported practices of internists regarding survivorship care as it pertains to sexual dysfunction.

DESIGN: Surveys were sent to 406 physicians affiliated with the Department of Internal Medicine at the University of Colorado Denver School of Medicine. Of the 319 eligibles, 227 were returned (71% RR).

MAIN RESULTS: Of the 227 responders, 46% were "somewhat/very" likely to initiate a conversation about sexual dysfunction; 62% "never/rarely" addressed sexual dysfunction. Each additional weekly hour spent in patient care was associated with a 2% increase in the likelihood of sexual dysfunction being addressed or discussions about sexual dysfunction being initiated. Reported inadequate preparation/formal training around survivorship issues was associated with sexual dysfunction being addressed less often (odds ratio [OR]=0.45). Perception of patient anxiety or fears about health was associated with sexual dysfunction being addressed more often (OR=2.38). Perceived preparedness to evaluate long-term effects was associated with a greater likelihood of physicians initiating discussions about sexual functioning (OR=2.49).

CONCLUSIONS: Cancer survivors receive their long-term care from internists. Our results suggest that sexual dysfunction is often not addressed during their follow-up care. Additional training is needed to prepare physicians to negotiate this difficult issue.

KEY WORDS: general internist; survivorship; sexuality communication.
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BACKGROUND

With improved treatments, cancer survivors are now living longer than in the past. The overall 5-year survival rate for adults diagnosed with cancer between 1996 and 2003 is 65%, with approximately 11.1 million cancer survivors in the United States.¹ The Institute of Medicine's report, "From Cancer Patient to Cancer Survivor: Lost in Transition," highlighted the posttreatment needs of cancer survivors as well as the role of the primary care provider in the continuity of survivor care.²

As cancer survivors live longer, quality of life issues become increasingly important. Sexual dysfunction is one such issue that affects many cancer survivors. After treatment, approximately 20% to 30% of breast cancer survivors,³ 80% of prostate cancer survivors,⁴ 37% of Hodgkins survivors,⁵ and 58% of head and neck cancer survivors⁶ report sexual difficulties. Changes in body image, pain, and loss of desire result from both cancer and its treatment; long-term physical and psychological side effects from cancer treatments can affect sexual functioning.⁷ Long-term psychological responses, such as depression and anxiety about cancer, may alter the survivor's ability for intimacy and sexuality.^{8,9}

Many effective behavioral and pharmacological treatments for sexual dysfunction exist. However, to identify cancer survivors who may benefit from these treatments, conversations about sexual dysfunctions must be initiated. Survivors express a desire to be able to discuss sexual issues with medical professionals.⁹ However, there are barriers to these conversations for both patients and physicians. A public opinion poll of 500 adults in the United States showed that 85% would be willing to talk to their physicians if they had a sexual problem. However, 71% did not think that their physicians would be responsive or helpful, and 68% were concerned that their physicians would be uncomfortable.¹⁰ There has been limited research conducted about general practitioners (GPs) and sexual communication, particularly in the United States. Qualitative studies of GPs found that lack of knowledge, expertise, time, and comfort are barriers to these conversations.¹¹⁻¹⁴ In surveys conducted in the United Kingdom and Germany, GPs cited lack of time, lack of training and expertise, being of a different gender than the patient, and patient embarrassment as barriers to these discussions.^{13,15,16}

Much survivorship care is provided by internists, yet little is known about the attitudes and behaviors of internists regarding sexual health communication, particularly with cancer survivors. The objective of this study was to examine the

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Table 1. Baseline Physician and Practice Characteristics, Attitudes and Practices (N=227)

	Total*	“Usually/Always” vs. “Rarely/Never” Addresses Sexual Dysfunction	P value	“Somewhat/Very” vs. “Not at all/A little” Likely to Initiate a Conversation about Sexual Dysfunction	P value
PHYSICIAN AND PRACTICE CHARACTERISTICS					
Hours/week spent in direct patient care (mean, SD)	32.8 (16.2)	36.7 (16.2) vs. 30.9 (15.4)	0.01	36.2 (14.9) vs. 30.3 (16.3)	0.01
Years in practice (mean, SD)	21.2 (10.4)	23.1 (10.0) vs. 19.8 (10.6)	0.02	22.4 (10.2) vs. 19.9 (10.6)	0.08
		“Usually/Always” Addresses Sexual Dysfunction		“Somewhat/Very” Likely to Initiate a Conversation about Sexual Dysfunction	
Gender (%)			0.14		0.77
Female	39.7	31.4		45.4	
Male	60.3	41.2		47.3	
Practice setting (%)			0.003		0.08
Academic	31.7	44.3		37.7	
Community	68.3	23.2		50.3	
Race/Ethnicity (%)†			0.46		0.32
White	84.6	38.0		47.3	
Other	13.6	35.3		41.2	
Specialty (%)			0.60		0.40
Internal Medicine board certification	93.4	37.7		45.9	
Other board certification	6.6	36.4		54.5	
ATTITUDES (%)					
Comfort level			0.01		0.01
“Somewhat/very” comfortable providing care to survivors	87.7	14.8		49.7	
“Not at all/a little” comfortable providing care to survivors	12.3	40.8		22.2	
Prepared to evaluate long-term effects			0.02		0.001
“Somewhat/very” prepared	50.2	44.9		57.9	
“Somewhat/very” unprepared	49.8	29.9		34.6	
PERCEIVED BARRIERS TO SURVIVORSHIP CARE (%)					
Lack of practical experience in caring for cancer survivors			0.14		0.13
“No/small” problem	77.6	40.2		49.1	
“Moderate/big” problem	22.4	28.6		36.7	
Lack of time to adequately address survivorship issues			0.02		0.10
“No/small” problem	57.6	44.4		51.6	
“Moderate/big” problem	42.4	29.4		40.2	
Inadequate preparation/formal training around survivorship issues			0.01		0.10
“No/small” problem	52.8	46.0		52.2	
“Moderate/big” problem	47.2	29.4		40.2	
Limited access to cancer specialists			0.87		0.55
“No/small” problem	89.5	37.4		45.6	
“Moderate/big” problem	10.5	39.1		52.2	
Limited access to non-cancer specialists			0.75		0.11
“No/small” problem	92.2	37.3		44.8	
“Moderate/big” problem	7.8	41.2		64.7	
Inadequate access to cancer treatment history			0.12		0.74
“No/small” problem	63.9	41.4		47.1	
“Moderate/big” problem	36.1	30.8		44.9	
Lack of standards of care for adult survivors			0.52		0.37
“No/small” problem	47.5	40.2		50.0	
“Moderate/big” problem	52.5	36.0		43.9	
Patient anxiety or fears about health			0.02		0.96
“No/small” problem	71.2	32.9		46.5	
“Moderate/big” problem	28.8	49.2		46.0	
Patient reluctance to discuss cancer history			0.41		0.77
“No/small” problem	97.7	38.0		46.5	
“Moderate/big” problem	2.3	20.0		40.0	
Limited access to mental health referrals for survivors			0.53		0.81
“No/small” problem	54.3	39.5		47.1	
“Moderate/big” problem	45.7	35.4		45.5	

*Please note that percentages in columns might not add up to 100 due to missing data.

†Other race (%): Asian (9.0), Black/African American, (1.4), Hispanic/Latino (2.3), and Other (0.9).

attitudes and reported practices of internists regarding cancer survivorship care as it pertains to sexual dysfunction.

DESIGN

Data Collection

Methods have been described previously.^{17,18} A survey was developed to examine the attitudes and practices of physicians regarding survivorship care, which was informed by a literature review and in-depth interviews and pretested with community and academic-based physicians. The survey consisted of 45 multiple choice items presented in a 5-page printed color booklet titled, “Caring for Cancer Survivors: Challenge and Opportunity.” The introduction explained that survey addressed outpatient primary care practitioners’ views and experiences with cancer survivors. Contact information for potentially eligible physicians came from the Division of General Internal Medicine mailing lists from the Department of Internal Medicine at the University of Colorado Denver School of Medicine. Data collection began in September 2007 and was completed in March 2008. Participants received a \$20 cash incentive, a USB flash drive, or both for completed surveys. Surveys were sent via U.S. mail, Federal Express, or electronic mail to 406 community-based and academic-based internists in Denver, Colorado. Seventy-two surveys were returned by physicians who did not provide direct outpatient primary care and thus were not eligible; 15 surveys were returned due to incorrect addresses. Of the remaining 319 mailed surveys, 227 were returned (71% response rate).

Measures

Survey questions included: *physician and practice characteristics* (gender, race/ethnicity, specialty, practice setting, number of years in practice, and number of hours/week spent in direct patient care), *attitudes about providing survivor care* (comfort level in providing care to survivors, perceived preparedness to evaluate the long-term effects of survivorship, and perceived barriers to survivorship care [10 questions listed

in Table 1], and *survivorship care practices around sexual dysfunction*. We examined two study outcomes about *survivorship care practices around sexual dysfunction*: a) addressing sexual dysfunction (“Thinking about adult cancer survivors in your panel, how often do you address sexual dysfunction?”) and b) initiating a discussion about sexual dysfunction (“How likely are you to initiate discussion about sexual functioning with adult cancer survivors?”). The first variable illustrates whether these conversations occur in a clinical encounter, and the second variable elucidates whether the physician is responsible for bringing up this topic. Comfort level in providing care to survivors (“Not at all” to “Very”), perceived preparedness to evaluate the long-term effects of survivorship (“Very Unprepared” to “Very Prepared”), perceived barriers (“No Problem” to “Big Problem”), and survivorship care practices around sexual dysfunction (“Never” to “Always”; “Not at all likely” to “Very likely”) were rated on 4-point scales.

Analysis

Statistical analyses were conducted using SAS statistical software version 9.0. Descriptive statistics were run for physician and practice characteristics, attitudes, and survivorship care practices around sexual dysfunction. Attitudes and sexual dysfunction practices were dichotomized. Univariable analyses (chi-square tests were used for categorical variables, t-tests for continuous variables) were run with physician and practice characteristics and attitudes by sexual dysfunction practices. Factors associated with sexual dysfunction practices at P<0.25 level in the univariable analyses were included in stepwise logistic regression analyses to obtain our final models.

MAIN RESULTS

Participant and practice characteristics, and associations with care practice around sexual dysfunction, are displayed in Table 1; 93.4% specialized in internal medicine. While most (88%) were “somewhat/very” comfortable providing care to adult cancer survivors, almost half said that they were “very/somewhat” unprepared to evaluate the long-term effects of adult cancer survivors. Moreover, only 46% reported that they were “somewhat/very” likely to initiate a conversation about

Table 2. Factors Associated with “Usually/Always” Addressing Sexual Dysfunction with Adult Cancer Survivors

Variables	OR (95% CI)
Time spent in direct patient care services	1.02 (1.00–1.04)
Inadequate preparation/formal training around survivorship issues	0.45 (0.25–0.83)
Patient anxiety or fears about health	2.38 (1.23–4.46)

Abbreviations: CI confidence interval, OR odds ratio. Variables P<0.25 at the univariable analysis, as indicated in Table 1, were included in the multivariable model. Only variables that were independently significant with the outcome are displayed in this table, adjusting for: years in practice, hours/week spent in direct patient care, gender, practice setting, comfort level providing care to survivors, preparedness to evaluate long-term effects, and barriers (lack of practical experience in caring for cancer survivors, lack of time to adequately address cancer survivorship issues, inadequate preparation/formal training around survivorship issues, inadequate access to patients’ cancer treatment history, and patient anxiety or fears about health).

Table 3. Factors Associated with ‘Somewhat/Very’ Likely to Initiate a Conversation about Sexual Dysfunction with Adult Cancer Survivors

Variables	OR (95% CI)
Time spent in direct patient care services	1.02 (1.00–1.05)
Preparedness to evaluate the long-term effects of adult survivors	2.49 (1.41–4.39)

Abbreviations: CI confidence interval, OR odds ratio. Variables P<0.25 at the univariable analysis, as indicated in Table 1, were included in the multivariable model. Only variables that were independently significant with the outcome are displayed in this table, adjusting for: years in practice, hours/week spent in direct patient care, practice setting, comfort level providing care to survivors, preparedness to evaluate long-term effects, and barriers (lack of practical experience in caring for cancer survivors, lack of time to adequately address cancer survivorship issues, inadequate preparation/formal training around survivorship issues, limited access to noncancer specialists).

sexual dysfunction with cancer survivors, and 62% admitted they “never/rarely” addressed sexual dysfunction with cancer survivors (data not shown).

Tables 2 and 3 display factors associated with “usually/always” addressing sexual dysfunction and being “some-what/very” likely to initiate a conversation about sexual dysfunction. More hours spent in direct patient care was associated with sexual dysfunction being addressed and discussions about sexual dysfunction being initiated (OR=1.02; CI=1.00–1.04; OR=1.02; CI=1.00–1.05, respectively). A perception of inadequate preparation/formal training around survivorship issues was associated with sexual dysfunction being addressed less often (OR=0.45; CI=0.25–0.83). A perception of patient anxiety or fears about health was associated with sexual dysfunction being addressed more often (OR=2.38; CI=1.23–4.46). Perceived preparedness to evaluate the long-term effects of adult survivors was associated with greater likelihood of initiation of a discussion about sexual functioning (OR=2.49; CI=1.41–4.39).

CONCLUSIONS

The numbers of cancer survivors being seen in internal medicine practices are growing, and accordingly the role of internists in survivorship care is expanding. Our results indicate that although the majority of physicians felt comfortable in the provision of overall care to survivors, sexual dysfunction is often not addressed during this care. Although sexual dysfunction is a common and important issue for cancer survivors, more than half of physicians claimed that they never or rarely discussed sexual dysfunction with their patients who were cancer survivors.

Perceived lack of preparation and training were associated with fewer conversations about sexual dysfunction. Our findings suggested that physicians who indicated that they spent more time in direct patient care services conveyed that they were more likely to address and initiate conversations about sexual dysfunction during this clinical care. Perhaps physicians simply gain an enhanced comfort level as a function of more experience with patients and greater exposure to accompanying issues. Physicians also responded that these conversations would be more likely to occur if a patient’s anxiety was perceived as a problem. A patient’s concerns might catalyze these discussions, but, interestingly, a patient’s anxiety was not an indicator of increased likelihood of a physician initiating these conversations. Surprisingly, in the multivariable analyses, lack of time was not a barrier to these discussions.

This study has a few limitations. Physicians were surveyed from only one region in the country and all had an academic affiliation, which limits the generalizability of the results. The results are based on self-reported data. Data were not collected on the types of cancer survivors in respondents’ practices. Nevertheless, this study is unique in that it is, to our knowledge, the first quantitative examination of U.S. internists’ perspectives about an understudied aspect of survivorship – sexual health – and differentiates between whether sexual health conversations occur and whether physicians initiate these conversations.

There is a great need for increased assessment and support of sexual health in the medical encounter, particularly for

survivors. Sexual health is not emphasized in medical training curricula,¹⁹ but our results indicate that additional training is needed to prepare internists to facilitate conversations about sex. These conversations can help normalize concerns for patients, debunk myths, provide a basis for brief counseling, or serve as an entree for a referral. A growing literature provides recommendations for clinicians about communication on sexual health.^{12,20} As internists’ focus on cancer survivorship care continues to grow, hopefully sexual functioning conversations will become more frequent in their medical encounters.

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Conflicts of Interest: Drs. Bober, Campbell, Recklitis, and Diller have no conflicts of interest to disclose. Dr. Park reports that Pfizer has supplied medication for a pilot smoking cessation trial. Dr. Kutner reports receiving honoraria from 1) the Ovations Professional Advisory Committee (United Health Care) and 2) for a talk for Anthem/Wellpoint; she also reports receiving royalties from McGraw-Hill for authorship of “Practice Guidelines in Primary Care.”

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