

BRIEF REPORTS

Nutrition Assessment and Counseling Practices: Attitudes and Interests of Primary Care Physicians

Karen Glanz, PhD, MPH, Chariklia Tziraki, MD, Cheryl L. Albright, PhD, MPH,
Jorge Fernandes, MA

This survey examined the nutrition-related practices and office services of primary care physicians, and their preferred nutrition topics and educational methods. Respondents were 960 physicians from across the United States who were members of the Society of General Internal Medicine. A four-page mailed questionnaire with 21 items queried background information, nutrition-related clinical practices and office support systems, perceived self-efficacy for nutrition assessment and counseling, and nutrition-related educational preferences. Two-thirds of the respondents said they personally provided nutrition counseling. They reported moderate self-efficacy for nutrition counseling and lower confidence for using specific relapse prevention strategies. Greatest interest in further education related to chronic disease prevention and nutrition for the elderly, provided in convenient formats for practicing physicians.

KEY WORDS: nutrition counseling; nutrition assessment; primary care physicians; nutrition education.

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There is now broad consensus among health professionals that healthful diets can promote health and reduce the risks of chronic diseases and their sequelae.¹⁻⁴ Current public health recommendations in the United States place high priority on including nutrition education in all routine health care contacts.⁵ Primary care physicians are uniquely positioned to help con-

sumers adopt more healthful eating patterns because they often manage behavior-based health risks,^{6,7} are influential within the health care system,⁸ and are viewed as a credible source of information about nutrition and health.⁹ However, despite trends of increased awareness and belief in the benefit of nutrition, and a modest increase in practices,^{10,11} several surveys, and studies using chart reviews, reveal substantial discrepancies between guidelines and actual practices.¹²

Studies of the determinants of physicians' nutritional care practices suggest two categories of influential factors: the knowledge, attitudes, and skills of physicians; and the characteristics of the health care practice environment. Key physician factors found to be associated with more nutrition counseling include belief in the efficacy of diet and of dietary counseling^{11,13-16} and high self-efficacy, i.e., physicians' confidence in their ability to effectively counsel patients to change eating patterns.^{13,14,16} Additional barriers related to the practice environment, such as lack of time, staff, payment, or insurance coverage.^{11,13,15}

The aims of this study were: 1) to assess the nutrition-related practices and supporting office services of primary care physicians, and 2) to identify nutrition topics and educational methods most preferred by respondents.

METHODS

We conducted a mailed survey of primary care physicians who were members of the Society of General Internal Medicine (SGIM) in spring 1992. The self-administered questionnaire was developed specifically to address the objectives of this survey. After peer review of the draft and two pretests with 150 primary care physicians (non-SGIM members) in three cities, the survey was revised to improve clarity, relevance, and face validity.

The final survey instrument was a brief, four-page questionnaire with 21 items (many with subsections) in five parts: 1) demographic and practice-related descriptive information, 2) nutrition-related clinical practices, 3) office practice support systems, 4) perceived self-efficacy (self-confidence) in conducting nutrition assess-

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Address correspondence and reprint requests to Dr. Glanz: Cancer Prevention and Control Program, Cancer Research Center of Hawaii, University of Hawaii, 1236 Lauhala Street, Honolulu, HI 96813.

Table 1
Self-efficacy for Nutrition Counseling Strategies (n = 941)

Strategy to Provide/Assist Patients with Dietary Change	Not at All Confident (%)	Moderately Confident (%)	Extremely Confident (%)	Mean (SD)*
Provide specific nutrition information	9.8	44.7	45.5	59.7 (23.9)
Set short-term goals	10.3	48.5	41.3	56.9 (23.4)
Increase patient motivation	10.6	53.1	36.3	54.8 (22.8)
Recommend specific dietary changes	12.5	51.5	36.0	54.4 (23.7)
Give specific maintenance advice (relapse prevention)	19.1	55.4	25.6	47.2 (23.9)

*Range of self-efficacy ratings: 0 to 100. Adjectival ratings (not at all, moderately, extremely confident) were shown on the questionnaire above the low, middle, and high rating numbers.

ment and counseling, and 5) nutrition-related educational preferences.

The questionnaire was mailed to the entire membership of SGIM (n = 1,897). Members of SGIM are primary care physicians and other health providers and health services researchers. (This report is based only on responses of the *physician* members). After two mailings, 960 usable completed questionnaires were returned, for a response rate of 52.8%. Data analyses reported here are limited to descriptive statistics.

RESULTS

Characteristics of Respondents

The physicians who responded to the survey were 66.8% men and their patients came primarily from urban and inner-city areas (71.1%). Thirty-nine percent had practiced more than ten years postresidency, and 55% reported devoting more than half their time to patient care. About three-fourths reported that their responsibilities included teaching students and/or housestaff, followed by working in an ambulatory clinic (54.4%), residency training (50.6%), and outpatient (35.7%) and inpatient clerkships (29.4%). A substantial proportion reported that they had personally attempted dietary change for weight loss (63.9%) or cholesterol lowering (48.5%).

Nutrition Assessment and Counseling Practices

Two-thirds of the respondents reported that they personally provided nutrition counseling for their patients. Such counseling was also frequently provided by the office dietitian (45.8%) or nurse (22.5%), or a dietitian outside the practice (36.6%). Nonphysicians were most often designated to carry out dietary assessment (58.4%), distribute nutrition educational materials (56.9%), answer nutrition questions (53.5%), and determine ideal body weight (32.1%).

The physicians were asked how often they personally conducted eleven specific nutrition assessment and counseling tasks, when indicated. These tasks were divided into four categories: dietary counseling, oral dietary assessment, written dietary assessment, and an-

thropometric assessment. The respondents were asked to rate their usage as either never, sometimes, usually, or always. Of the four categories, they reported "usually" or "always" conducting dietary counseling most consistently, especially cholesterol counseling (79.6%) and advising patients about specific dietary changes (45%). The only other task usually/always carried out by more than half the respondents was asking patients about their dietary intakes of fat and cholesterol (64.2%). A minority of the physicians reported usually/always asking patients about their intakes of calcium (37.4%), fruits and vegetables (36.1%), and fiber (36.7%). Fewer than 5%

Table 2
Topics of Interest and Preferred Educational Modalities for Nutrition in Patient Care (n = 960)

Moderately/very interested by topic (%)	
Nutritional needs of the elderly	72.7
Osteoporosis	72.4
Nutrition counseling techniques	71.6
Weight reduction, obesity	71.3
Diabetes	62.6
Cholesterol	62.5
Cancer and diet	60.1
Dietary fat	59.7
Drug/nutrient interactions	59.2
Fiber	55.8
Vitamins and minerals	49.9
Recommended daily allowances, dietary adequacy	42.0
Sports nutrition	39.9
Nutrition quackery	38.6
Fad diets	38.4
Interested in various educational modalities (%)	
Nutrition workshops at national or regional professional meetings	60.6
Nutrition newsletter with references, as a teaching resource	60.2
Self-paced home computer/video learning program	48.6
Stand-alone nutrition curriculum package with slides and handouts	42.0
One-to-two-day workshop on nutrition for primary care physicians	41.9
Combined didactic program/preceptorship for three to six weeks at a leading nutrition center	4.2
A mini-fellowship for three months or more	3.3

usually/always conducted any written dietary assessment, measured skin folds, or determined waist-to-hip ratio.

Among the physicians who provided counseling, most respondents (70.3%) reported that they discussed dietary change for 5 minutes or less at a single visit. Only 8.7% typically (i.e., usually or always) counseled patients about diet for 9 minutes or longer.

Self-efficacy for Nutrition Counseling Practices

To assess self-efficacy for nutrition counseling, the respondents were asked to rate their confidence for each of five counseling strategies on a scale from 0 to 100 (0 = no confidence and 100 = extreme confidence). Table 1 lists their responses in descending order, showing both the percentages in the low (0 to 35), middle (36 to 64), and high confidence (65 to 100) categories and the mean scores. For all five strategies, the physicians' mean scores ranged between 47 and 60. They were most confident about being able to provide nutrition information (mean of 59.7), followed by helping patients set short-term dietary change goals (mean of 56.9), increasing patients' motivation (mean of 54.8), providing specific recommendations (mean of 54.5), and advising patients about maintenance of change or relapse prevention (mean of 47.2).

Training Interests and Preferred Educational Modalities

Table 2 shows the nutrition topics that respondents reported being most interested in learning more about. The highest "interest" ratings were for topics related to nutrition and the elderly, prevention and management of chronic disease risk, and nutrition counseling. The survey also examined the ratings of various educational modalities (Table 2). Workshops at national or regional professional meetings and a nutrition newsletter that could also be a teaching resource were the highest-rated approaches. There was moderate interest in self-paced home computer or video learning programs, stand-alone curriculum packages, and one-to-two-day workshops.

DISCUSSION

Similar to the results of other recent studies,^{7, 17} a majority of internal medicine/primary care physicians who responded to our survey reported that they personally counsel patients about nutrition issues, especially lowering dietary fat and cholesterol. They also reported using nonphysician health care professionals (e.g., dietitians, nurses) for nutrition assessment, counseling, and distribution of patient education materials. Use of written dietary assessments and advice about specific nutrients (e.g., calcium and fiber) were low. The respondents' confidence in their ability to motivate and guide patients who need to change their diets was mod-

erate. When asked to report their interest in specific nutrition topics, a majority were interested in nutritional needs of the elderly, chronic disease prevention, and specific nutrition counseling techniques. To obtain such training the respondents were most interested in typical professional activities such as workshops; newsletters were also rated highly and computer curricula received moderately high ratings.

The generalizability of our survey results is limited to internists, mainly academic physicians. Because the response rate was only 53%, our results should be interpreted cautiously and may not apply to all community-based primary care physicians. Our respondents may also represent a select group of physicians who are particularly interested in nutrition issues, at least sufficiently to return a mailed survey. Also, these results are based on self-report measures. Thus, our results for the percentage of physicians who advise patients about nutrition issues may encourage an overoptimistic view of the actual proportion of physicians who provide such advice.

The unique contribution of this survey to the field is its sample, which consisted largely of physicians who are directly involved in clinical teaching and patient care with residents. Faculty physicians are critical to the teaching and practice of nutrition counseling because they train the physicians who will use such methods with their future patients. Thus, while we found room for improvement in the respondents' practices, our results are encouraging and hopeful. Many of our respondents were interested in learning more about how to incorporate nutrition topics into clinical practice and clinical teaching. Innovative and convenient methods that provide them with training in effective methods for stimulating and maintaining dietary change should be developed and made available to these physicians.

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