

# SPIKES—A Six-Step Protocol for Delivering Bad News: Application to the Patient with Cancer

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**Key Words.** *Neoplasms · Physician-patient relations · Truth disclosure · Educational models*

## ABSTRACT

We describe a protocol for disclosing unfavorable information—"breaking bad news"—to cancer patients about their illness. Straightforward and practical, the protocol meets the requirements defined by published research on this topic. The protocol (SPIKES) consists of six steps. The goal is to enable the clinician to fulfill the four most important objectives of the interview disclosing bad news: gathering information from the patient, transmitting the medical

information, providing support to the patient, and eliciting the patient's collaboration in developing a strategy or treatment plan for the future. Oncologists, oncology trainees, and medical students who have been taught the protocol have reported increased confidence in their ability to disclose unfavorable medical information to patients. Directions for continuing assessment of the protocol are suggested. *The Oncologist* 2000;5:302-311

## BACKGROUND

Surveys conducted from 1950 to 1970, when treatment prospects for cancer were bleak, revealed that most physicians considered it inhumane and damaging to the patient to disclose the bad news about the diagnosis [1, 2]. Ironically, while treatment advances have changed the course of cancer so that it is much easier now to offer patients hope at the time of diagnosis, they have also created a need for increased clinician skill in discussing other bad news. These situations include disease recurrence, spread of disease or failure of treatment to affect disease progression, the presence of irreversible side effects, revealing positive results of genetic tests, and raising the issue of hospice care and resuscitation when no further treatment options exist. This need can be illustrated by information collected by an informal survey conducted at the 1998 Annual Meeting of the American Society of Clinical Oncology (ASCO), where we queried attendees at a symposium on communication skills. For this symposium several experts in teaching aspects of the doctor-patient relationship in oncology formulated a series of questions to assess attendees' attitudes and practices regarding breaking bad news. Of the 700 persons attending the symposium, which was repeated twice over a

two-day period, 500 received a transponder allowing them to respond in "real time" to questions that were presented on a screen. The results were immediately analyzed for discussion and are presented in Table 1. We asked participants about their experiences in breaking bad news and their opinions as to its most difficult aspects. Approximately 60% of respondents indicated that they broke bad news to patients from 5 to 20 times per month and another 14% more than 20 times per month. These data suggest that, for many oncologists, breaking bad news should be an important communication skill.

However, breaking bad news is also a complex communication task. In addition to the verbal component of actually giving the bad news, it also requires other skills. These include responding to patients' emotional reactions, involving the patient in decision-making, dealing with the stress created by patients' expectations for cure, the involvement of multiple family members, and the dilemma of how to give hope when the situation is bleak. The complexity of the interaction can sometimes create serious miscommunications [3-6] such as patient misunderstanding about the prognosis of the illness or purpose of care [7-12]. Poor communication may also thwart the goal of

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Received March 9, 2000; accepted for publication June 12, 2000. ©AlphaMed Press 1083-7159/2000/\$5.00/0

**Table 1.** Results of survey of participants at Breaking Bad News Symposium, American Society of Clinical Oncology, 1998<sup>1,2</sup>

Questions	Day 1 (%)	Day 2 (%)	Average (%)
1. In an average month, how often do you have to break bad news to a patient (e.g., diagnosis, recurrence, progressive disease, etc.)?			
Less than 5 times	22.2	24.1	23.2
5 to 10 times	32.1	31.0	31.6
10 to 20 times	34.3	27.8	31.0
More than 20	11.4	17.1	14.2
2. Which do you find the most difficult task?			
Discussing diagnosis	1.8	6.3	4.0
Telling patient about recurrence	31.5	21.4	26.4
Talking about end of active treatment and beginning palliative treatment	46.1	44.2	45.2
Discussing end-of-life issues (e.g., do not resuscitate)	15.8	23.2	19.5
Involving family/friends of patient	4.8	4.9	4.9
3. Have you had any specific teaching or training for breaking bad news?			
Formal teaching	5.6	4.0	4.8
Sat in with clinicians in breaking bad news interviews	41.5	35.9	38.7
Both	15.2	12.1	13.6
Neither	37.7	48.0	42.0
4. How do you feel about your own ability to break bad news?			
Very good	11.7	14.3	13.0
Good	40.9	39.4	40.2
Fair	40.9	37.1	39.0
Poor	6.5	8.8	7.6
Very poor	0.0	0.4	0.25
5. What do you feel is the most difficult part of discussing bad news?			
Being honest but not taking away hope	54.9	61.1	58.0
Dealing with the patient's emotion (e.g., crying, anger)	28.8	21.5	25.1
Spending the right amount of time	10.6	10.1	10.3
Involving friends and family of the patient	5.7	7.3	6.5
Involving patient or family in decision-making			
6. Have you had any training in the techniques of responding to patient's emotions?			
Formal teaching	9.1	6.4	7.8
Sat in with practicing clinician	32.5	34.4	33.5
Both	10.3	9.6	9.9
Neither	48.1	49.6	48.8
7. How would you rate your own comfort in dealing with patient's emotions (e.g., crying, anger, denial, etc.)?			
Quite comfortable	35.8	29.6	32.7
Not very comfortable	46.1	47.2	46.7
Uncomfortable	18.1	23.2	20.6
8. Did you find that the SPIKES made sense to you?			
Yes	94.3	95.4	94.8
No	5.7	4.6	5.2
9. Would a strategy or approach to breaking bad news interviews be helpful to you in your practice?			
Yes	88.2		
No	11.8		
10. Do you feel that the SPIKES is practical and can be used in your clinical practice?			
Yes	95.4		
No	4.6		
11. When you break bad news to your patients, do you have a consistent plan or strategy in mind?			
Have a consistent plan or strategy		26.1	
Several techniques/tactics but no overall plan		51.9	
No consistent approach to task		22.0	
12. Which element of the SPIKES protocol do you think you would find most easy?			
S-Setting		36.1	
P-Patient's perception		13.6	
I-Invitation		11.4	
K-Knowledge		17.5	
E-Exploring/Empathy		7.5	
S-Strategy/Summary		13.9	
13. Which element of the SPIKES protocol do you think you would find most difficult?			
S-Setting		1.9	
P-Patient's perception		16.4	
I-Invitation		18.6	
K-Knowledge		7.4	
E-Exploring/Empathy		52.4	
S-Strategy/Summary		3.3	

<sup>1</sup>Some questions asked on the first day were not included on day 2. Additional questions were added on day 2 based on response to questions of the previous day. <sup>2</sup>Presented in part at the Annual Meeting of the American Society of Clinical Oncology, New Orleans, LA, May 19-23, 2000.

understanding patient expectations of treatment or involving the patient in treatment planning.

The task of breaking bad news can be improved by understanding the process involved and approaching it as a step-wise procedure, applying well-established principles of communication and counseling. Below we describe a six-step protocol, which incorporates these principles.

### **A DEFINITION OF BAD NEWS**

Bad news may be defined as “any information which adversely and seriously affects an individual’s view of his or her future” [13]. Bad news is always, however, in the “eye of the beholder,” such that one cannot estimate the impact of the bad news until one has first determined the recipient’s expectations or understanding. For example, a patient who is told that her back pain is caused by a recurrence of her breast cancer when she was expecting to be told it was a muscle strain is likely to feel shocked.

### **BREAKING BAD NEWS: WHY IS IT IMPORTANT?**

#### **A Frequent but Stressful Task**

Over the course of a career, a busy clinician may disclose unfavorable medical information to patients and families many thousands of times [14]. Breaking bad news to cancer patients is inherently aversive, described as “hitting the patient over the head” or “dropping a bomb” [6]. Breaking bad news can be particularly stressful when the clinician is inexperienced, the patient is young, or there are limited prospects for successful treatment [3].

#### **Patients Want the Truth**

By the late 1970s most physicians were open about telling cancer patients their diagnosis [15]. However, studies began to indicate that patients also desired additional information. For example, a survey published in 1982 of 1,251 Americans [16] indicated that 96% wished to be told if they had a diagnosis of cancer, but also that 85% wished, in cases of a grave prognosis, to be given a realistic estimate of how long they had to live. Over many years a number of studies in the United States have supported these findings [17-23], although patient expectations have not always been met [24-27]. European patients’ wishes have been found to be similar to those of American patients. For example, a study of 250 patients at an oncology center in Scotland showed that 91% and 94% of patients, respectively, wanted to know the chances of cure for their cancer and the side effects of therapy [28].

#### **Ethical and Legal Imperatives**

In North America, principles of informed consent, patient autonomy, and case law have created clear ethical and legal

obligations to provide patients with as much information as they desire about their illness and its treatment [29, 30]. Physicians may not withhold medical information even if they suspect it will have a negative effect on the patient. Yet a mandate to disclose the truth, without regard or concern for the sensitivity with which it is done or the obligation to support the patients and assist them in decision-making, can result in the patients being as upset as if they were lied to [4]. As has been aptly suggested, the practice of deception cannot instantly be remedied by a new routine of insensitive truth telling [31].

### **Clinical Outcomes**

How bad news is discussed can affect the patient’s comprehension of information [32], satisfaction with medical care [33, 34], level of hopefulness [35], and subsequent psychological adjustment [36-38]. Physicians who find it difficult to give bad news may subject patients to harsh treatments beyond the point where treatment may be expected to be helpful [39]. The idea that receiving unfavorable medical information will invariably cause psychological harm is unsubstantiated [40, 41]. Many patients desire accurate information to assist them in making important quality-of-life decisions. However, others who find it too threatening may employ forms of denial, shunning or minimizing the significance of the information, while still participating in treatment.

### **WHAT ARE THE BARRIERS TO BREAKING BAD NEWS?**

*Tesser* [42] and others conducted psychological experiments that showed that the bearer of bad news often experiences strong emotions such as anxiety, a burden of responsibility for the news, and fear of negative evaluation. This stress creates a reluctance to deliver bad news, which he named the “MUM” effect. The MUM effect is particularly strong when the recipient of the bad news is already perceived as being distressed [43]. It is not hard to imagine that these factors may operate when bad news must be given to cancer patients [44, 45].

The participants in our previously mentioned ASCO survey identified several additional stresses in giving bad news. Fifty-five percent ranked “how to be honest with the patient and not destroy hope” as most important, whereas “dealing with the patient’s emotions” was endorsed by 25%. Finding the right amount of time was a problem for only 10%.

Despite these identified challenges, less than 10% of survey respondents had any formal training in breaking bad news and only 32% had the opportunity during training to regularly observe interviews where bad news was delivered. While 53% of respondents indicated that their ability to break bad news was good to very good, 39% thought that it was only fair, and 8% thought it was poor.

From this information and other studies we may conclude that for many clinicians additional training in disclosing unfavorable information to the patient could be useful and increase their confidence in accomplishing this task. Moreover, techniques for disclosing information in a way that addresses the expectations and emotions of the patients also seem to be strongly desired, but rarely taught.

### HOW CAN A STRATEGY FOR BREAKING BAD NEWS HELP THE CLINICIAN AND THE PATIENT?

When physicians are uncomfortable in giving bad news they may avoid discussing distressing information, such as a poor prognosis, or convey unwarranted optimism to the patient [46]. A plan for determining the patient's values, wishes for participation in decision-making, and a strategy for addressing their distress when the bad news is disclosed can increase physician confidence in the task of disclosing unfavorable medical information [47, 48]. It may also encourage patients to participate in difficult treatment decisions, such as when there is a low probability that direct anticancer treatment will be efficacious. Finally, physicians who are comfortable in breaking bad news may be subject to less stress and burnout [49].

### A SIX-STEP STRATEGY FOR BREAKING BAD NEWS

The authors of several recent papers have advised that interviews about breaking bad news should include a number of key communication techniques that facilitate the flow of information [3, 13, 50-54]. We have incorporated these into a step-by-step technique, which additionally provides several strategies for addressing the patient's distress.

#### Complex Clinical Tasks May Be Considered as a Series of Steps

The process of disclosing unfavorable clinical information to cancer patients can be likened to other medical procedures that require the execution of a stepwise plan. In medical protocols, for example, cardiopulmonary resuscitation or management of diabetic ketoacidosis, each step must be carried out and, to a great extent, the successful completion of each task is dependent upon the completion of the step before it.

#### Goals of the Bad News Interview

The process of disclosing bad news can be viewed as an attempt to achieve four essential goals. The first is gathering information from the patient. This allows the physician to determine the patient's knowledge and expectations and readiness to hear the bad news. The second goal is to provide intelligible information in accordance with the patient's needs and desires. The third goal is to support the patient by

employing skills to reduce the emotional impact and isolation experienced by the recipient of bad news. The final goal is to develop a strategy in the form of a treatment plan with the input and cooperation of the patient.

Meeting these goals is accomplished by completing six tasks or steps, each of which is associated with specific skills. Not every episode of breaking bad news will require all of the steps of SPIKES, but when they do they are meant to follow each other in sequence.

### THE SIX STEPS OF SPIKES

#### STEP 1: S—SETTING UP the Interview

Mental rehearsal is a useful way for preparing for stressful tasks. This can be accomplished by reviewing the plan for telling the patient and how one will respond to patients' emotional reactions or difficult questions. As the messenger of bad news, one should expect to have negative feelings and to feel frustration or responsibility [55]. It is helpful to be reminded that, although bad news may be very sad for the patients, the information may be important in allowing them to plan for the future.

Sometimes the physical setting causes interviews about sensitive topics to flounder. Unless there is a semblance of privacy and the setting is conducive to undistracted and focused discussion, the goals of the interview may not be met. Some helpful guidelines:

- *Arrange for some privacy.* An interview room is ideal, but, if one is not available, draw the curtains around the patient's bed. Have tissues ready in case the patient becomes upset.
- *Involve significant others.* Most patients want to have someone else with them but this should be the patient's choice. When there are many family members, ask the patient to choose one or two family representatives.
- *Sit down.* Sitting down relaxes the patient and is also a sign that you will not rush. When you sit, try not to have barriers between you and the patient. If you have recently examined the patient, allow them to dress before the discussion.
- *Make connection with the patient.* Maintaining eye contact may be uncomfortable but it is an important way of establishing rapport. Touching the patient on the arm or holding a hand (if the patient is comfortable with this) is another way to accomplish this.
- *Manage time constraints and interruptions.* Inform the patient of any time constraints you may have or interruptions you expect. Set your pager on silent or ask a colleague to respond to your pages.

## STEP 2: P—ASSESSING THE PATIENT'S PERCEPTION

Steps 2 and 3 of SPIKES are points in the interview where you implement the axiom “before you tell, ask.” That is, before discussing the medical findings, the clinician uses open-ended questions to create a reasonably accurate picture of how the patient perceives the medical situation—what it is and whether it is serious or not. For example, “What have you been told about your medical situation so far?” or “What is your understanding of the reasons we did the MRI?”. Based on this information you can correct misinformation and tailor the bad news to what the patient understands. It can also accomplish the important task of determining if the patient is engaging in any variation of illness denial: wishful thinking, omission of essential but unfavorable medical details of the illness, or unrealistic expectations of treatment [56].

## STEP 3: I—OBTAINING THE PATIENT'S INVITATION

While a majority of patients express a desire for full information about their diagnosis, prognosis, and details of their illness, some patients do not. When a clinician hears a patient express explicitly a desire for information, it may lessen the anxiety associated with divulging the bad news [57]. However, shunning information is a valid psychological coping mechanism [58, 59] and may be more likely to be manifested as the illness becomes more severe [60]. Discussing information disclosure at the time of ordering tests can cue the physician to plan the next discussion with the patient. Examples of questions asked the patient would be, “How would you like me to give the information about the test results? Would you like me to give you all the information or sketch out the results and spend more time discussing the treatment plan?”. If patients do not want to know details, offer to answer any questions they may have in the future or to talk to a relative or friend.

## STEP 4: K—GIVING KNOWLEDGE AND INFORMATION TO THE PATIENT

Warning the patient that bad news is coming may lessen the shock that can follow the disclosure of bad news [32] and may facilitate information processing [61]. Examples of phrases that can be used include, “Unfortunately I’ve got some bad news to tell you” or “I’m sorry to tell you that...”.

Giving medical facts, the one-way part of the physician-patient dialogue, may be improved by a few simple guidelines. First, start at the level of comprehension and vocabulary of the patient. Second, try to use nontechnical words such as “spread” instead of “metastasized” and “sample of tissue” instead of “biopsy.” Third, avoid excessive bluntness (e.g.,

“You have very bad cancer and unless you get treatment immediately you are going to die.”) as it is likely to leave the patient isolated and later angry, with a tendency to blame the messenger of the bad news [4, 32, 61]. Fourth, give information in small chunks and check periodically as to the patient’s understanding. Fifth, when the prognosis is poor, avoid using phrases such as “There is nothing more we can do for you.” This attitude is inconsistent with the fact that patients often have other important therapeutic goals such as good pain control and symptom relief [35, 62].

## STEP 5: E—ADDRESSING THE PATIENT'S EMOTIONS WITH EMPATHIC RESPONSES

Responding to the patient’s emotions is one of the most difficult challenges of breaking bad news [3, 13]. Patients’ emotional reactions may vary from silence to disbelief, crying, denial, or anger.

When patients get bad news their emotional reaction is often an expression of shock, isolation, and grief. In this situation the physician can offer support and solidarity to the patient by making an empathic response. An empathic response consists of four steps [3]:

- First, observe for any emotion on the part of the patient. This may be tearfulness, a look of sadness, silence, or shock.
- Second, identify the emotion experienced by the patient by naming it to oneself. If a patient appears sad but is silent, use open questions to query the patient as to what they are thinking or feeling.
- Third, identify the reason for the emotion. This is usually connected to the bad news. However, if you are not sure, again, ask the patient.
- Fourth, after you have given the patient a brief period of time to express his or her feelings, let the patient know that you have connected the emotion with the reason for the emotion by making a connecting statement. An example:

**Doctor:** I’m sorry to say that the x-ray shows that the chemotherapy doesn’t seem to be working [pause]. Unfortunately, the tumor has grown somewhat.

**Patient:** I’ve been afraid of this! [Cries]

**Doctor:** [Moves his chair closer, offers the patient a tissue, and pauses.] I know that this isn’t what you wanted to hear. I wish the news were better.

In the above dialogue, the physician observed the patient crying and realized that the patient was tearful because of the bad news. He moved closer to the patient. At



this point he might have also touched the patient's arm or hand if they were both comfortable and paused a moment to allow her to get her composure. He let the patient know that he understood why she was upset by making a statement that reflected his understanding. Other examples of empathic responses can be seen in Table 2.

Until an emotion is cleared, it will be difficult to go on to discuss other issues. If the emotion does not diminish shortly, it is helpful to continue to make empathic responses until the patient becomes calm. Clinicians can also use empathic responses to acknowledge their own sadness or other emotions ("I also wish the news were better"). It can be a show of support to follow the empathic response with a validating statement, which lets the patient know that their feelings are legitimate (Table 3).

Again, when emotions are not clearly expressed, such as when the patient is silent, the physician should ask an exploratory question before he makes an empathic response. When emotions are subtle or indirectly expressed or disguised as in thinly veiled disappointment or anger ("I guess this means I'll have to suffer through chemotherapy again") you can still use an empathic response ("I can see that this is upsetting news for you"). Patients regard their oncologist as one of their most important sources of psychological support [63], and combining empathic, exploratory, and validating statements is one of the most powerful ways of providing that support [64-66] (Table 2). It reduces the patient's isolation, expresses solidarity, and validates the patient's feelings or thoughts as normal and to be expected [67].

**Table 2.** Examples of empathic, exploratory, and validating responses

Empathic statements	Exploratory questions	Validating responses
"I can see how upsetting this is to you."	"How do you mean?"	"I can understand how you felt that way."
"I can tell you weren't expecting to hear this."	"Tell me more about it."	"I guess anyone might have that same reaction."
"I know this is not good news for you."	"Could you explain what you mean?"	"You were perfectly correct to think that way."
"I'm sorry to have to tell you this."	"You said it frightened you?"	"Yes, your understanding of the reason for the tests is very good."
"This is very difficult for me also."	"Could you tell me what you're worried about?"	"It appears that you've thought things through very well."
"I was also hoping for a better result."	"Now, you said you were concerned about your children. Tell me more."	"Many other patients have had a similar experience."

**Table 3.** Changes in confidence levels among participants in workshops on communicating bad news

Breaking bad news	Fellows		Faculty	
	<i>p</i> -value	<i>t</i> score	<i>p</i> -value	<i>t</i> score
Plan the discussion in advance	.010	-3.087	.001	-4.01
Create a comfortable setting	.037	-2.377	.007	-3.08
Encourage family/friend presence	.101*	-1.792	.396	.87*
Assess patient's ability to discuss bad news	.016	-2.836	<.001	-4.49
Confirm patient's understanding of cancer	.005	-3.553	.002	-3.66
Assess how much patient wants to know	.003	-3.734	.019	-2.62
Organize a strategy for disclosing information	.002	-4.025	.004	-3.32
Include family/caregiver in discussion	.043	-2.293	.038	-2.26
Provide information in small increments	.005	-3.512	.027	-2.43
Avoid medical jargon	.057*	-2.125	.006	-3.13
Check to see if information was correctly received by patient	.059*	-2.107	.001	-4.18
Reinforce and clarify information	.016	-2.829	.020	-2.58
Detect anxiety	.003	-3.817	.004	-3.41
Detect sadness	.030	-2.485	.009	-2.96
Handle the patient's emotional reactions	.004	-3.676	.020	-2.58
Respond empathetically	.034	-2.420	.023	-2.53

\*Not significant.

## STEP 6: S—STRATEGY AND SUMMARY

Patients who have a clear plan for the future are less likely to feel anxious and uncertain. Before discussing a treatment plan, it is important to ask patients if they are ready at that time for such a discussion. Presenting treatment options to patients when they are available is not only a legal mandate in some cases [68], but it will establish the perception that the physician regards their wishes as important. Sharing responsibility for decision-making with the patient may also reduce any sense of failure on the part of the physician when treatment is not successful. Checking the patient's misunderstanding of the discussion can prevent the documented tendency of patients to overestimate the efficacy or misunderstand the purpose of treatment [7-9, 57].

Clinicians are often very uncomfortable when they must discuss prognosis and treatment options with the patient, if the information is unfavorable. Based on our own observations and those of others [1, 5, 6, 10, 44-46], we believe that the discomfort is based on a number of concerns that physicians experience. These include uncertainty about the patient's expectations, fear of destroying the patient's hope, fear of their own inadequacy in the face of uncontrollable disease, not feeling prepared to manage the patient's anticipated emotional reactions, and sometimes embarrassment at having previously painted too optimistic a picture for the patient.

These difficult discussions can be greatly facilitated by using several strategies. First, many patients already have some idea of the seriousness of their illness and of the limitations of treatment but are afraid to bring it up or ask about outcomes. Exploring the patient's knowledge, expectations, and hopes (step 2 of SPIKES) will allow the physician to understand where the patient is and to start the discussion from that point. When patients have unrealistic expectations (e.g., "They told me that you work miracles."), asking the patient to describe the history of the illness will usually reveal fears, concerns, and emotions that lie behind the expectation. Patients may see cure as a global solution to several different problems that are significant for them. These may include loss of a job, inability to care for the family, pain and suffering, hardship on others, or impaired mobility. Expressing these fears and concerns will often allow the patient to acknowledge the seriousness of their condition. If patients become emotionally upset in discussing their concerns, it would be appropriate to use the strategies outlined in step 5 of SPIKES. Second, understanding the important specific goals that many patients have, such as symptom control, and making sure that they receive the best possible treatment and continuity of care will allow the physician to frame hope in terms of what it is possible to accomplish. This can be very reassuring to patients.

## EXPERIENCE WITH THE SPIKES PROTOCOL

### Oncologists' Assessment of SPIKES

In the ASCO survey mentioned previously, we asked participants if they felt the SPIKES protocol would be useful in their practice. Ninety-nine percent of those responding found that the SPIKES protocol was practical and easy to understand. They reported, however, that using empathic, validating, and exploring statements to respond to patient emotions would be the greatest challenge of the protocol (52% of respondents).

In teaching, the SPIKES protocol has been incorporated into filmed scenarios, which appear as part of a CD-ROM on physician-patient communication [67]. These scenarios have proven useful in teaching the protocol and in initiating discussion of the various aspects of breaking bad news.

### Does the SPIKES Protocol Reflect the Consensus of Experts?

Very few studies have sampled patient opinion as to their preferences for disclosure of unfavorable medical information [69]. However, of the scarce information available, the content of the SPIKES protocol closely reflects the consensus of cancer patients and professionals as to the essential elements in breaking bad news [3, 13, 50-54]. In particular, SPIKES emphasizes the techniques useful in responding to the patient's emotional reactions and supporting the patient during this time.

### Can Students and Clinicians Learn to Use the Protocol?

Most medical undergraduate and postgraduate programs do not usually offer specific training in breaking bad news [70] and most oncologists learn to break bad news by observing more experienced colleagues in clinical situations [39]. At the University of Texas M.D. Anderson Cancer Center we used the SPIKES protocol in interactive workshops for oncologists and oncology fellows. As an outcome, before and after the workshop we used a paper and pencil test to measure physician confidence in carrying out the various skills associated with SPIKES. We found that the SPIKES protocol in combination with experiential techniques such as role play can increase the confidence of faculty and fellows in applying the SPIKES protocol [47] (Table 3). Undergraduate teaching experience also showed that the protocol increased medical students' confidence in formulating a plan for breaking bad news [71].

## DISCUSSION

In clinical oncology the ability to communicate effectively with patients and families can no longer be thought of as an optional skill [72]. Current ASCO guidelines for curriculum development do not yet include recommendations

for training in essential communication skills [73]. However, a study by *Shea* of 2,516 oncologists showed interest in additional training in this area [74]. *Shea's* findings regarding communication skills were echoed by our ASCO survey participants, many of whom reported a lack of confidence in ability to break bad news. A specific lack of training opportunities appeared to play a major role in leading to this problem, as almost 40% of respondents not only had no didactic training but also did not have an opportunity to gain experience from observing other clinicians breaking bad news.

Several papers have clearly demonstrated that communication skills can be taught and are retained [47, 48, 71, 75, 76]. The SPIKES protocol for breaking bad news is a specialized form of skill training in physician-patient communication, which is employed in teaching communication skills in other medical settings [77]. These key skills are an important basis for effective communication [78]. Employing verbal skills for supporting and advocating for the patient represents an expanded view of the role of the oncologist, which is consistent with the important objective of medical care of reducing patient suffering. They form the basis for patient support, an essential psychological intervention for distress.

We recognize that the SPIKES protocol is not completely derived from empirical data, and whether patients

will find the approach recommended as useful is still an important question. However, its implementation presupposes a dynamic interaction between physician and patient in which the clinician is guided by patient understanding, preferences, and behavior. This flexible approach is more likely to address the inevitable differences among patients than a rigid recipe that is applied to everyone.

## FUTURE DIRECTIONS

We are currently in the process of determining how the bearer of bad news is affected psychophysiologically during the process of disclosure. We plan to determine empirically whether the SPIKES protocol can reduce the stress of breaking bad news for the physician, and also improve the interview and the support as experienced by the patient. We are further investigating patient preferences for bad news disclosure, using many of the steps recommended in SPIKES, across a variety of disease sites and by age, gender, and stage of disease. Preliminary data indicate that, as recommended in SPIKES, patients wish the amount of information they receive to be tailored to their preferences. We are also conducting long-term follow-up of workshops in which the protocol has been taught to oncologists and oncology trainees to determine empirically how it is implemented.

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