Physicians’ Decisions to Withhold and Withdraw Life-Sustaining Treatment

Neil J. Farber, MD; Pamela Simpson, MD; Tabassum Salam, MD; Virginia U. Collier, MD; Joan Weiner, PhD; E. Gil Boyer, EdD

Background: Few data are available about physicians’ decisions in regard to withholding or withdrawing life-sustaining measures. We therefore studied internists’ views on this subject.

Methods: We surveyed 1000 generalist and subspecialist internists about their views on withholding or withdrawing life-sustaining treatment. Thirty-two hypothetical cases were included. The effect of the demographic data on withholding or withdrawing treatment was analyzed via analysis of covariance and multiple logistic regression.

Results: Of 1000 internists, 407 (41%) completed and returned surveys. A majority of respondents (51%) were willing to withhold or withdraw treatment in all 32 scenarios; 49% were unwilling to withhold or withdraw in at least 1 scenario. Respondents withheld treatment in 14 of 16 scenarios compared with 13.7 of 16 scenarios for withdrawing treatments ($P<.001$). Respondents withheld or withdrew feeding tubes in 6.6 of 8 scenarios ($P=.001$) and antibiotics in 6.7 of 8 scenarios ($P=.001$) compared with ventilators (7.1 of 8 scenarios) and dialysis (7.3 of 8 scenarios). Respondents were less likely to withhold or withdraw treatments in non-terminally ill (12.9 of 16 scenarios) ($P=.02$) and alert patients (13.2 of 16 scenarios) ($P<.001$) compared with terminally ill patients (14.9 of 16 scenarios) and patients with dementia (14.5 of 16 scenarios).

Conclusions: A large percentage of internists would be unwilling to adhere to some of patients’ wishes to withhold or withdraw life-sustaining treatment. The clinical scenario and type of treatment affect internists’ decisions about whether they would withhold or withdraw such treatment.

Arch Intern Med. 2006;166:560-564

Here has been a consensus in the medical literature that patients have a moral and legal right to have their physicians adhere to their wishes in regard to various forms of medical treatment.1 The rights of patients to refuse various forms of medical care have especially been discussed in regard to end-of-life treatment. From an ethical viewpoint, physicians are seen to have a moral obligation to withhold or withdraw care when a competent patient desires it based on the principle of patient autonomy, which has become preeminent since Western medicine has shifted from a focus on paternalism.2

In addition to the moral obligation of physicians to withhold or withdraw treatment when desired by patients, there is a legal imperative for physicians to do so. The common-law court rulings have supported patients’ rights to insist on withholding and withdrawing care at the end of life based on the principles of informed consent and informed refusal.3 In addition, some courts, including the US Supreme Court, have indicated that patients have a constitutional right to have treatments withheld and withdrawn based on the 14th Amendment to the US Constitution, which protects individuals’ rights to privacy.4 The ethical and legal imperatives of patients’ self-determination in regard to medical treatment have been codified by the American Medical Association (AMA).5

See also page 493

Few data are available in the medical literature about the decisions physicians would make when encountering patients who request that life-sustaining measures be withheld or withdrawn. In a study of 256 physicians practicing in Rhode Island, Fried et al.6 using hypothetical case scenarios, found that a larger percentage of respondents would withhold intubation than...
would turn off the respirator of a competent, terminally ill patient. However, although various issues were explored as to the reasoning of the respondent physicians, the case scenarios were not directly compared. Thus, no firm conclusions could be drawn about physicians’ comparative willingness to withhold and withdraw intubation. Moss et al examined the decision to withhold or withdraw dialysis at patients’ requests but made no comparison between withholding and withdrawing care. One study has examined the comparison of decisions to withhold and withdraw hemodialysis as made by practicing nephrologists and found that decisions to withhold dialysis were more frequent than those to withdraw it. However, the reasons behind these differences were not explored. No data are available on the comparisons of decisions regarding withholding or withdrawing different types of life-sustaining treatment.

The purpose of this study was therefore to survey internists about their views on the withholding and withdrawing of life-sustaining treatment in patients. We examined comparisons between withholding and withdrawing care between competent and incompetent patients, between terminally ill and nonterminally ill patients, and among different types of life-sustaining therapy. We hypothesized that, given previous data on some aspects of withholding vs withdrawing treatment, respondents would be more likely to withhold than to withdraw life-sustaining treatments. We also postulated that because of various concerns about what some consider to be the starvation of patients, artificial hydration and nutrition would be less likely to be withheld or withdrawn than other types of life-sustaining treatment.

**METHODS**

We conducted a cross-sectional mailed survey of 1000 randomly selected internists in the United States, identified through the AMA master file, a comprehensive list of US physicians not limited to AMA members. Students, residents, and nonpracticing physicians were excluded. The study, which was approved by the institutional review board of Christiana Care Health System, Wilmington, Del, included 500 general internists and 500 internal medicine subspecialists. The survey was accompanied by a $5 (cash) incentive. We sent all nonrespondents a second mailing. Confidentiality was assured because the survey had no identifying information, and coded envelopes (to determine nonrespondents) were discarded before the coding of the data. All responses received by June 1, 2004, were included in the analysis. The survey was pretested among 50 practicing physicians at Christiana Care Health System for face validity.

The survey asked respondents about cases of patients who request that treatment be withheld or withdrawn. Thirty-two case scenarios were included, which varied according to the type of treatment to be withdrawn or withheld, the capacity of the patient to make decisions, the medical condition of the patient (terminally ill or quadriplegic), and the type of treatment in question. (Examples of the scenarios are available from the authors.) Respondents were instructed to assume that the treatments were necessary to sustain the patients’ lives, that the patients (or, in the case of a patient with dementia, the family who decided via substituted judgment) were not depressed, that no acute, reversible problem existed, and that the decisions were clearly expressed. For patients with dementia, no mention was made of an advance directive. Respondents were asked to indicate how likely they would be to withhold or withdraw treatment in each scenario, based on a 4-point Likert-type scale (4, very likely; 3, likely; 2, unlikely; and 1, very unlikely). Respondents were also asked whether they had training of any type (self-defined) in end-of-life care. Demographic questions about the respondents also were included.

Data were entered for analysis manually by 2 individuals, with a cross check of 30% of the sample; no errors were detected. The number of scenarios in which respondents would be somewhat or very likely to withhold or withdraw care was calculated as a separate variable for all scenarios and for each type of patient condition or type of treatment. The effects of the demographic data of respondents on the number of scenarios in which care is withheld or withdrawn were analyzed via analysis of covariance and multiple logistic regression. Types of treatments and patient conditions were compared using logistic regression analyses.

**RESULTS**

Of the 1000 questionnaires, 29 were returned undelivered. Of the 1000 internists who received surveys, 407 (41%) returned questionnaires. Respondents’ demographic and professional characteristics are shown in the Table. The responding internists had an average age of 49 years, and most were male and married. The practices of most respondents were in urban or suburban settings, and most were private practices; general inter-
nists and medicine subspecialists were both represented. The respondents spent an average of 87% of their time seeing patients. Only 14% of respondents had personally experienced a life-threatening illness in themselves or a loved one, and 36% had training in end-of-life care.

Forty-nine percent of all respondents indicated that they would be unwilling to withhold or withdraw life-sustaining treatments in at least 1 of the 32 scenarios, and 8% indicated they would be unwilling to withhold or withdraw such care in at least half (16) of the 32 scenarios (Figure 1). The type of treatment had a significant impact on respondents' decisions to withhold or withdraw treatments. Respondents were significantly less likely to withhold or withdraw artificial nutrition and hydration than either a ventilator \( (P < .001) \) or hemodialysis \( (P < .001) \) (Figure 2). In addition, respondents were significantly less likely to withhold or withdraw treatment with antibiotics than either ventilatory support \( (P = .001) \) or dialysis \( (P < .001) \). As seen in Figure 3, respondents were also significantly more likely to withhold various treatments than to withdraw them once started \( (P < .001) \). The type of patient also correlated with the decision to withhold or withdraw life-sustaining treatment; patients with dementia \( (P < .001) \) and terminally ill patients \( (P = .02) \) were more likely to have treatments withheld or withdrawn than alert and nonterminally ill patients (Figure 4). The demographic variables that were analyzed did have a clinically significant impact on respondents' decisions to withhold or withdraw life-sustaining treatment.

**COMMENT**

The withholding and withdrawing of life-sustaining treatment has both ethical and legal foundations in the United States. The reluctance to withhold or withdraw treatments is influenced by the type of treatment, the condition of the patient, and the demographic characteristics of the respondents. Further research is needed to better understand the factors that influence these decisions and to improve communication and decision-making in end-of-life care.
States. From an ethical perspective, patient autonomy, beneficence, and nonmaleficence are the principles that support a patient's right to refuse or ask for removal of any type of therapy. Legally, a person's right to self-determination as provided in the 14th Amendment to the US Constitution also grants this right to patients. Several US Supreme Court decisions have ruled in the favor of a patient or a surrogate who requests the withdrawal of life-sustaining treatment.

Despite the legal and ethical imperatives for physicians to accede to the wishes of the patient in withholding or withdrawing life-sustaining treatment, in many cases even patients with clear decisional capacity have been disallowed from having such treatment withheld or withdrawn. Such unwanted medical interventions may cause a prolongation of the dying process.

In the present study, many internists were unwilling to withhold or withdraw life-sustaining treatments from some hypothetical patients. Several factors may have affected the respondents' decisions in these cases. Respondents may have viewed the withholding or withdrawing of treatment as directly leading to the patients' death (as opposed to the underlying disease process) and may have wanted to avoid the psychological responsibility for that death. Also, despite the greater shift in emphasis on patient autonomy, many physicians may fear the loss of authority in allowing patients to make such decisions. The internists in this study also may have viewed many of the medical treatments as routine because of their daily work with such technology. Finally, a lack of training and understanding of the ethical and legal issues involved in end-of-life care may cause physicians to disagree about what is ethically and legally required in cases where patients request the withholding or withdrawing of life-sustaining therapy.

Withdrawing treatment can often be more difficult at an emotional level because the withdrawal of treatment can be viewed as leading to the death of the patient, whereas withholding treatment simply allows the natural condition of the patient to cause death. In our study, respondents were significantly more likely to withhold any of the treatments in all types of patients than to withdraw such treatments. Physicians have been shown to be more likely to withhold than to withdraw dialysis in previous studies. In our study, internists were more likely to withhold than withdraw any type of life-sustaining treatment.

In contrast to a previous study involving dialysis in which no difference was seen between patients with or without decisional capacity, in the present study respondents were significantly more likely to withhold or withdraw life-sustaining treatments from patients who were decisionally impaired than from those who were alert and able to make decisions for themselves. Despite the fact that court cases have supported the rights of the competent patients to request that any type of care be withheld or withdrawn, some physicians have stated that it is unethical to allow patients who retain decisional capacity to forego life-sustaining treatment. The respondents in this survey may also have been uncomfortable with the decision to withhold or withdraw such treatment from a patient who can make such decisions, despite the legal imperative.

This study has some limitations. Most important, the data are self-reports by internists; no attempts were made to assess the actual behaviors by primary care physicians in withdrawing life-sustaining treatments from patients. Thus, respondents may have reported that they engaged in such behaviors more than they actually did. Second, the low response rate may introduce the possibility of nonrespondent bias. However, the age, sex, and medical specialty of the respondents in this survey is similar to that of practicing physicians in the United States in 1997 to 1998. In addition, we did not specifically address the thought processes that respondents used in making decisions about life-sustaining treatments. Issues such as physicians' knowledge of the legal rights of patients, their ethical and legal views, and the psychological aspects of such decision making will need to be explored.
with decisional capacity or of a surrogate in the case of a patient with decisional impairment. Physicians should be educated about the ethical and legal obligations of adhering to patients' wishes regarding life-sustaining treatments, along with the ethical and legal equivalency of withholding and withdrawing such treatments. They should explore ways of obtaining end-of-life care training in a hospice or palliative care setting and/or find experts in hospice and palliative medicine to assist them with these difficult decisions.

Accepted for Publication: August 23, 2005.

Correspondence: Neil J. Farber, MD, Christiana Care Health System, 501 W 14th St, Wilmington, DE 19899 (nfarber@christianacare.org).

Financial Disclosure: None.

Funding/Support: This study was supported by a grant from the Osler Fund of the Department of Medicine, Christiana Care Health System.

Previous Presentation: This study was presented in part at the Annual Meeting of the American Academy of Hospice and Palliative Medicine; January 20, 2005; New Orleans, La.

Acknowledgment: We thank Marie Hougentogler, BS, for her secretarial assistance and the librarians of Christiana Care Health System for their assistance in performing a literature search and obtaining references.

REFERENCES

16. Lowe SL. The right to refuse treatment is not a right to be killed. J Med Ethics. 1997;23:154-158.