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Good Samaritan Laws and Graduate Medical Education: A Tristate Survey

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Abstract

Objective: To assess the awareness of Good Samaritan laws among residents and fellows and the factors affecting the likelihood of a physician-in-training performing a Good Samaritan act.

Participants and Methods: A survey was distributed via official e-mail to Mayo Clinic residents and fellows at Mayo Clinic's 3 locations: Rochester, Minnesota; Scottsdale, Arizona; and Jacksonville, Florida. The survey was open from August 4 to 25, 2015, at the Arizona and Florida sites and from August 10 to 31, 2015, at the Minnesota site. Responses were collected anonymously and analyzed, using descriptive statistics and regression models.

Results: The survey was sent to 1591 trainees and 19.7% (313) responded. Nearly half the respondents (49%) experienced a medical emergency that required assistance by a medically trained person and reported that increased medicolegal knowledge would increase their likelihood of helping (47%). Almost all (93.6%) felt that awareness of the Good Samaritan laws was essential for a medical professional and reported a need for further education to increase their knowledge (89.3%).

Conclusion: Residents and fellows asked for education about Good Samaritan laws and suggested that such education may increase their likelihood of helping in medical emergencies.

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Medical emergencies outside of medical settings are common. The American Heart Association extrapolated data from the Resuscitation Outcomes Consortium and estimated that there were around 424,000 emergency medical services (EMS) assessed out-of-hospital cardiac arrests in the United States in 2013.[1] Another study examining the records of a medical communications center representing about 10% of the global flight passenger volume estimated an incidence of 1 in-flight medical emergency per 604 flights.[2] The United States Census Bureau estimated 10.8 million motor vehicle accidents in 2009.[3]

When informed, the EMS personnel strive to reach the scene as soon as possible. Until they arrive, bystanders may be the only people available to render help. Bystander response to such emergencies is crucial because the timeliness considerably impacts health outcomes for these patients.[4-8] The care patients receive before EMS arrival is critical. Clearly, it would be more beneficial if the bystander is a medically trained professional compared with a layman. Medically trained professionals are usually familiar with basic life support (BLS) and advanced cardiac life support (ACLS), may have had similar experiences with medical emergencies, and can be expected to provide more efficient and appropriate evidence-based management.

Good Samaritan laws are enacted to protect individuals from liability when they offer assistance to strangers in emergencies. All 50 states in the United States have Good Samaritan laws. Provisions of these laws have minor variations from state to state. They offer protection when assistance is provided at the scene of emergency, in good faith, without preexisting doctor-patient relationship, without expectation of compensation, and when no acts of gross negligence or maleficence are committed.[9,10] Good Samaritan acts performed onboard airplanes are protected under the Federal Aviation Medical Assistance Act of 1998.[9,11] Thus, every physician-in-training who responds to a medical emergency in the United States is protected by Good Samaritan laws. Similar laws exist in most other countries.

We hypothesized that physicians-in-training may hesitate to provide help to a stranger because of lack of knowledge regarding the protection offered by Good Samaritan laws. Therefore, we aimed to explore the level of knowledge about the law and the possible impact of such knowledge on the likelihood of helping in medical emergencies.

PARTICIPANTS AND METHODS

This was a cross-sectional survey developed by the study investigators, deemed exempt by the Mayo Clinic Institutional Review Board, and funded by an intramural small grant. The cover letter for consent (Supplemental Appendix 1, available online at http://mcpiqojournal.org/) was sent with the survey questionnaire (Supplemental Appendix 2, available online at http://mcpiqojournal.org/). No compensation was offered for participation. The survey aimed to elicit responses pertaining to the medical trainees' attitudes and awareness of the Good Samaritan laws and gather demographic data including age, sex, level of training, and specialty.

Study Population

The survey was sent to all residents and fellows enrolled at the Mayo Clinic School of Graduate Medical Education during August 2015 (3 sites in Rochester, Minnesota; Scottsdale, Arizona; and Jacksonville, Florida). The survey was open from August 4 to 25, 2015, at the Arizona and Florida sites and from August 10 to 31, 2015, at the Minnesota site. Nonresponders were not tracked or specifically contacted. General reminder e-mails were sent on day 8 and day 15 after the initial e-mail. Responses were consolidated and analyzed by the authors.

Statistical Analyses

The analysis was conducted in October 2015. Descriptive analyses as well as multiple regression models were used to predict the factors that would increase the likelihood of medical trainees helping in a non—work-related medical emergency.

Subgroup analyses were done on the basis of sex, age, training specialty, and the postgraduate year (PGY) of training. The relationship between being in an emergency situation in the past and the current willingness to help was also explored. The software used for analysis was STATA 12.1. (StataCorp LP). A P value of less than .05 was considered to indicate statistical significance. Concern of litigation arising from a Good Samaritan act was gauged with a Likert scale ranging from 0 (no concern) to 10 (very concerned). For the purpose of analysis, the scores were grouped into 3 categories of 0 to 3, 4 to 6, and 7 and above corresponding to low, moderate, and high concern, respectively.

Ages were categorized as ranges of less than 26, 26 to 30, 31 to 35, and more than 35 years. Specialty of training was categorized into 6 major categories (Medicine and related specialties, Surgery and related specialties, Neurology, Pediatrics, Nonclinical specialties, and others). Pediatrics, Neurology, Nonclinical, and the Others category were combined into one group for the purpose of regression analysis. The PGY of training was treated as a continuous variable for use in regression analysis.

RESULTS

The survey was sent to 1591 trainees of whom 1228 trainees were at Rochester, Minnesota, 164 at Scottsdale, Arizona, and 199 at Jacksonville, Florida. A total of 313 (19.7%) trainees responded. Further results are reported per question (Table 1).

Of 296 respondents, 155 (52.4%) identified as male and 141 (47.6%) identified as female; 164 (55.4%) of the respondents were younger than 31 years, 103 (34.8%) were aged 31 to 35 years, and 29 (9.8%) were 36 years and older. One hundred sixty-two (51.8%) of the respondents were training in Internal Medicine or related subspecialties, whereas 88 (28.1%) were training in General Surgery and related specialties. The rest were training in Neurology (21; 6.7%), Pediatrics (9; 2.9%), and other nonclinical specialties (13; 4.1%).

Most of the PGYs in training were equally represented, with the exception of PGY 7 and PGY 8 trainees. Table 2 contains the baseline characteristics of the respondents.

Of the respondents, 152 (48.6%; 95% CI, 43.5%-54.5%) had been in a situation in which there was a need for a medically trained person to respond outside their regular work hours and workplace. Of these respondents, 55% had at least one such incident in the preceding 12 months.

TABLE 1. Surveys Questions and Responses[a]

Survey question	Answer	N (%)
Have you ever been in a situation in which there was a need for a medically trained person to respond?	Yes	152 (48.6)
	No	160 (51.3)
How many times in the past 12 mo?	0-2 situations	146 (96.1% of those who answered yes)
	>3 situations	6 (3.9% of those who answered yes)
Which of the following factors would increase the likelihood of you assisting in a situation in which there is a need for a medically trained person to respond?[b]	Confidence in your medical knowledge	275
	Confidence in your medicolegal knowledge	141
	Other	6
How comfortable are you regarding your knowledge of Good Samaritan laws?	Comfortable	123 (41.1)
	Not comfortable	176 (58.9)
How confident or not confident are you about Good Samaritan laws protecting Good Samaritan acts that you may perform?	Confident	148 (49.3)
	Not confident	152 (50.7)
Do you think that awareness of Good Samaritan laws is essential for a medical professional (eg, MDs, DOs, and equivalents)?	Yes	279 (93.6)
	No	19 (6.4)
Do you think there is a need for education to increase knowledge about Good Samaritan laws during the training of a medical professional?	Yes	268 (89.3)
	No	29 (9.8)
When do you think training regarding Good Samaritan laws would be most appropriate?	During medical school	117 (43.8)
	During residency	123 (46.1)
	Other	27 (10.1)
Before receiving the survey, have you ever specifically looked up Good Samaritan laws?	Yes	48 (16.3)
	No	246 (83.7)
On a scale of 0 to 10, with 0 being "No concern" and 10 being "Very concerned," please rate your level of concern regarding litigation arising out of a Good Samaritan act performed by you.	Concern	
	Low (0-3)	131 (44)
	Moderate (4-6)	100 (34)
	High (7-10)	64 (22)
Will you research Good Samaritan law once you finish this survey?	Yes	43 (14.6)
	No	81 (27.6)
Have you taken any undergraduate or postgraduate courses in the field of law?	Maybe	170 (57.8)
	Yes	12 (4.1)
	No	282 (95.9)

[a]MD = doctor of medicine; DO = doctor of osteopathic medicine.

[b]Choices for this question included confidence in medical knowledge, confidence in medicolegal knowledge, both equally, and other. Respondents who answered as both equally were included in both categories; thus, the resulting total is more than the number of respondents.

TABLE 2. Baseline Characteristics of Respondents[a]

Characteristic	No. (%)[b]
No. of respondents	313 (100)
Sex: (N=296), male	155 (52.4)
Age (y) (N=296)	
Younger than 31	164 (55.4)
31-35	103 (34.8)
36 or older	29 (9.8)
Training specialty	
Internal medicine	162 (51.8)
Surgery	88 (28.1)
Neurology	21 (6.7)
Pediatrics	9 (2.9)
Nonclinical	11 (3.5)
Other	2 (0.64)
PGY (N=296)	
PGY-1	54 (18.2)
PGY-2	47 (15.9)
PGY-3	47 (15.9)
PGY-4	41 (13.9)
PGY-5	48 (16.2)
PGY-6	31 (10.5)
PGY-7	22 (7.4)
PGY-8	6 (2.0)

[a]PGY = postgraduate year.
[b]Not all participants answered every question so percentages may not add up to 100.

Of 300 respondents, 153 (51%; 95% CI, 45.3%-56.7%) indicated that confidence in their medical knowledge alone would increase their likelihood of helping in an emergency situation, whereas 19 (6%; 95% CI, 3.3%-8.7%) indicated that confidence in their medicolegal knowledge alone would increase their likelihood of helping. A total of 122 (41%; 95% CI, 35.43%-46.57%) respondents said that both medical and medicolegal knowledge would increase their likelihood of helping equally, whereas 6 (2%; 95% CI, 0.4%-3.6%) respondents said that they would help regardless if they could be useful in the situation.

Thus, a total of 141 (47%; 95% CI, 41.4%-52.7%) respondents reported that increasing their confidence in the medicolegal knowledge would play a role in increasing their likelihood of helping. A total of 93.6% (95% CI, 91.3%-96.7%) of the respondents felt that awareness of the Good Samaritan laws was essential for a medical professional and 89.3% (95% CI, 86.6%- 93.4%) of the respondents felt that there is a need for additional education about Good Samaritan laws.

In this study, 46.1% (95% CI, 40%-52%) responded that training should be given during residency, whereas 43.8% (95% CI, 38.1%-49.9%) felt it should be provided during medical school. The remaining respondents requested education during both.

Regarding concern related to litigation arising out of a Good Samaritan act, 44% (95% CI, 38.3%-49.7%) reported low concern, 34% (95% CI, 28.6%-39.4%) reported moderate concern, and 22% (95% CI, 17.3%-26.7%) reported high concern.

In this study, 64.3% (95% CI, 58.5%-69.5%) of the respondents said that they never carry their medical license or a copy of it on their person. Only 22% (95% CI, 17.3%-26.7%) carried it all the time or most of the time.

Regression analysis showed that confidence in the Good Samaritan laws protecting Good Samaritan acts did not statistically differ on the basis of age, sex, PGY, or specialty. Similarly, the likelihood of helping did not differ on the basis of these covariates. There was no difference noted between respondents who have and those who have never been in an emergency situation with regard to the likelihood of helping and concern about litigation. There was also no difference between these 2 groups regarding the need for Good Samaritan education and whether knowledge regarding these laws was essential for a medical professional.

Only 4.1% (95% CI, 1.76%-6.24%) had taken a previous undergraduate or postgraduate course in the field of law, and 16.3% (95% CI, 11.81%-20.19%) of the 294 respondents had ever specifically looked up the Good Samaritan laws.

DISCUSSION

We surveyed residents and fellows and found that almost half the respondents had been in a situation in which there was a need for a medically trained person to respond, and half of those were just in the preceding year. Most respondents expressed a need for additional education about Good Samaritan laws and implied that increased knowledge and confidence in these laws would make them more likely to help.

Medical emergencies are ubiquitous. Bystanders are an integral and critical part of the response. They play a crucial role in the "chain of survival" in out-of-hospital cardiac arrest, including recognition of a medical emergency, activation of the EMS, delivering immediate high-quality cardiopulmonary resuscitation, and if possible, rapid defibrillation. Many studies have shown that bystander response to these medical emergencies is associated with positive outcomes, including increased survival to hospital discharge.[5,7]

However, these response rates are low.[12] The medical skills of the bystander who responds are also important. Thus, everything within reason should be done to encourage a medically trained bystander to help and hopefully deliver high-quality cardiopulmonary resuscitation when compared with a lay bystander.

There are many physicians-in-training graduating from medical schools every year. The National Resident Matching Program data from the 2015 Residency Match show that 26,252 individuals matched to PGY 1 positions.[13] These individuals are protected by the Good Samaritan laws. However, they may not be aware of this and may hesitate to offer assistance.

The present study sought to specifically explore liability as a barrier to offering assistance. It showed that more than half the trainees reported at least a moderate level of concern regarding litigation arising from Good Samaritan acts.

The number of physicians sued for Good Samaritan acts is likely very low. This study found that many trainee physicians are not very comfortable with the idea of providing help due to fear of a lawsuit. Most respondents agreed that awareness and education of the Good Samaritan laws is essential for health care professionals, similar to previous studies in this area.[14]

Almost half the respondents surveyed said that their confidence in the medicolegal knowledge would increase the likelihood of offering assistance. Therefore, increasing the knowledge of the Good Samaritan laws increases the likelihood of "bystander" trainee physicians to perform Good Samaritan acts. This is an important finding because although their presence at the scene of emergency is happenstance, their knowledge and confidence in the laws is a modifiable factor. Currently, there is no curriculum in medical school or graduate medical education designed to address this need.

We did not find any difference in the likelihood of helping between genders, consistent with the most recent study examining this topic in physicians.[15] We also did not find a difference in the willingness to help with the change in the years of postgraduate training. This may reflect the moral responsibility that the trainees feel they have regardless of training level.

Surgeons are more likely to face a lawsuit,[16] and it is reasonable to think that they may be more sensitized to the idea of medicolegal liability and have more concerns. However, this was not reflected in our study. This is also consistent with the North Carolina physician survey although our study population was medical trainees and the medical specialty distribution was different.[15]

Physicians-in-training in the United States include many non-US citizen international medical graduates. This group may be more hesitant to help in emergencies due to nonfamiliarity with a foreign legal system. However, this hypothesis was not tested in the current study and is worthy of exploration in future studies.

For medical emergencies that occur onboard a flight, the Aviation Medical Assistance Act of 1998 limits the liability of the air carriers if the "carrier in good faith believes that the passenger (offering assistance) is a medically qualified individual …"[11] It is common for the air crew to ask the responding individuals to show proof of a medical license. Our study found that most medical trainees did not carry such proof. Without a medical license, appropriate help to patients may be delayed. We therefore suggest that this fact be made known to medical trainees and physicians.

Opportune moments for education about the Good Samaritan laws are during medical school or graduate medical education, and during the mandatory BLS and ACLS training that all physicians-in-training have to undergo. The American Heart Association should strongly consider including this in the official BLS and ACLS manual and training sessions.

This survey used a convenience sample that may not represent all residents and fellows in the United States. The response rate was not high although comparable to 2 recent resident surveys.[17,18] A large majority of respondents belonged to Internal Medicine and related

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specialties and may not be generalizable to all specialties. Our sample was derived from 3 states, and results may not apply to all locales. Minnesota has a duty-to-act statute in an emergency.[9] Thus, Minnesota trainees, if aware of this state law, may be more willing to offer help.

CONCLUSION

Bystander response in medical emergencies occurring outside the medical settings is crucial for favorable outcomes. This survey suggests that residents and fellows in 3 states have an unmet need for education about Good Samaritan laws and that such education may increase their likelihood of performing Good Samaritan acts.

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SUPPLEMENTAL ONLINE MATERIAL

Supplemental material can be found online at http://mcpiqojournal.org/. Supplemental material attached to journal articles has not been edited, and the authors take responsibility for the accuracy of all data.

Abbreviations and Acronyms: **ACLS** = advanced cardiac life support; **BLS** = basic life support; **EMS** = emergency medical services; **PGY** = postgraduate year

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