Physician Willingness to Respond to Disasters: What Can We Learn?

Robert G. Hendrickson, MD

The availability of clinicians to respond to an acute disaster is an integral aspect of emergency management in the medical setting. Without a supply of clinicians who are ready to care for patients, it is difficult to imagine how a health care system would prepare for, or respond to, a large influx of patients (a ''surge'').

In this issue of the *Journal of Graduate Medical Education*, Snipes et al[1] describe their survey of several emergency medicine residency programs in academic health care centers and evaluate the projected response rates of faculty and residents. The authors found that physicians overall are very willing to respond to an acute disaster to care for patients, with 54% to 93% of physicians reporting they would respond to various events. These response rates are similar to previous reports and certainly reflect the robust physician response that typically is associated with acute events, such as mass casualty incidents and natural disasters.[1–3]

At the same time, the authors found that there are differences in projected response rates depending on the nature of the event. For example, 93% of respondents report willingness to come to work in the event of an explosion, but 84% to 86% would respond to a ''novel flu'' event, 66% to 72% would respond to a confirmed nuclear disaster, and only 54% to 60% would report after a blizzard. These differences in response rates may simply reflect the physicians' perceived need for a response (low emergency department volume in a blizzard), their ability to physically get to work (dangers of travel during a blizzard), the need to care for family (potential for ''snow days'' during a blizzard), or the perception that they or their family may be at risk (threats of a novel flu or nuclear disaster).[2–5]

If a physician could not or would not respond, what were their reasons? We should not be surprised that the most frequently reported determinant of a physician responding to a disaster was concern for their family. This response was consistent throughout the country and between faculty and residents. Importance of family obligations has been noted in previous studies and with other health care workers.[2,3,5] These findings suggest that if physicians are assured their families are safe, they may be more likely to respond and help others.

The study also found that a sizable portion of physicians (48% to 56%) report a lack of training regarding disasters. Whether this reflects a true lack of training or poor recall is not known. Training is essential for physicians to understand their role in a disaster, and training has been associated with higher response rates in previous studies.[4] Program directors and physician group leaders may need to prioritize disaster training to facilitate high response rates in a disaster. Training should be aimed at events that are appropriate for the geographic area and facility type (ie, office, hospital operating room, emergency department), and the events that are both most likely and of highest impact to the facility are typically listed in the facility's hazard vulnerability analysis. It is important to note that whether training for an overwhelming, but rare, event, such as a terrorist attack or chemical release, or a more frequent, lower-impact incident, such as a snowstorm or mass casualty incident, the principles are similar. The advantage of training is a physician workforce that has a higher response rate and is more comfortable in their roles in a disaster.

The authors asked respondents what disciplinary action should be taken for residents who do not respond in a disaster. The survey group overwhelmingly agreed that a resident-specific approach was most appropriate, with 15% to 32% suggesting no disciplinary action, 30% to 38% suggesting an informal program director meeting, and 17% to 24% suggesting a formal program director meeting with a ''paper trail.'' Only 2% to 4% suggested probation, and less than 1% suggested termination.

This study was unique in that it explored the projected disaster responses of physicians at different levels of training (residents and faculty) at training programs in geographically diverse locations. The findings are significant not only for the perceptions they describe but also for the questions they raise. This study asked respondents to project how they would act in a variety of scenarios. However, it is not known if those answers correlate to real response rates in a disaster. Studies analyzing response rates in true disasters and their correlation to survey results are needed. Future studies should seek real-time answers to the question ''Can you respond right now?'' by asking the question at specific days and specific times of the day

Robert G. Hendrickson, MD, is Associate Professor of Emergency Medicine at Oregon Health & Science University.

Corresponding author: Robert G. Hendrickson, MD, Department of Emergency Medicine, Oregon Health & Science University, 3181 SW Sam Jackson Park Road, Mailcode CDW-EM, Portland, OR 97239-3098, 503.494.9495, hendriro@ohsu.edu

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because that would more accurately assess a physician's "ability" to respond rather than their "willingness" to do so. Further, the authors asked a binary question: Would you respond or not? In a true disaster, physicians may require time to pick up their children, care for elders, and ensure that the house is protected from a flood or is safe after an earthquake before they can respond. Did the physicians who said that they could respond mean that they would respond in 12 hours? Of those who said that they could not respond, how many are available in 12 to 24 hours to replace those who immediately responded? What would the response rate be for support staff, including nursing, clerks, patient transport teams, and housekeeping?

Are the results of this study generalizable to other specialties and to community hospitals? Although this study examined emergency medicine resident and faculty physicians, certainly many of the issues may be universal to physician responses: need to care for family; concern about the safety of themselves and their family in infectious, chemical, or radiologic events; and a duty to care for patients in a crisis. It would be helpful to see additional studies involving different specialties and for individual programs to assess their faculty and resident responses.

What should program directors or hospital and physician group leaders take away from this article? First, faculty and residents are a heterogeneous group and will respond in a disaster at variable times because of family and other responsibilities. This heterogeneity should be embraced, not penalized, and should be incorporated into planning. Those who respond later can be used to replace those who respond immediately.

Faculty and residents should be encouraged to discuss disaster response with their families and to prepare their homes and families for disasters. Steps may include (1) developing a disaster kit in their homes that includes food, water, medicines, and supplies for several days; (2) developing a plan for how each family member responds and communicates in a disaster; and (3) encouraging home safety (eg, retrofitting for earthquake, hurricane, or floods). The American Red Cross website (http://www.redcross.org/flash/brr/english-html/default.asp) contains a good description of home preparedness. Focusing on home preparedness in program director discussions with residents in critical specialties is likely to be a more successful strategy than are policies prescribing probation or termination for failure to respond to a disaster. Consideration of the most effective content, appropriate specialties to target, and optimum levels of training for those discussions remain important areas for future study.

References

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