

## LETTER TO THE EDITOR

# Rural healthcare provider opinions about implementation of an after-hours rural telephone triage system

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## Dear Editor

We would like to draw your readers' attention to a small study investigating the use of a telephone triage system to improve after-hours access to healthcare services. We conducted the trial in Kerang District Hospital (KDH), located in the rural Loddon Mallee region of Northern Victoria, Australia. KDH serves 10 000 people in several districts with six GPs (ratio of 0.6/10,000 people vs Melbourne's 10.6/10,000)<sup>1</sup>. With the doctor shortage and no after-hours care, KDH sought to improve healthcare access by adapting and implementing the WestVic telephone triage system<sup>2</sup> in 2005. This project, which evaluated staff opinions about the system 8 months later, was a joint effort between

KDH staff and The University of Melbourne medical students who were undertaking a required rural experience course.

As part of a KDH-initiated quality improvement project, a draft questionnaire was developed and refined using a modified Delphi process<sup>3</sup>. The anonymous questionnaire was distributed to all triage staff in 2005. Results (5 point Likert scale, 1 = strongly disagree to 5 = strongly agree, and open-ended questions) were analysed using Microsoft Excel.

Nine of eleven nurses completed the questionnaire (82%). Respondents (n = 9) agreed that the system was well designed (mean 3.6±1.1). They agreed that they had



sufficient training (mean  $3.2\pm 0.8$ ), clear protocols (mean  $3.3\pm 1.0$ ), sufficient staff support (mean  $3.8\pm 1.0$ ), and agreed that the system benefits the community (mean  $4.1\pm 0.6$ ). However, they disagreed that the system had improved working hours (mean  $2.8\pm 0.8$ ) and workload (mean  $2.9\pm 0.8$ ).

Participants made 13 comments; seven of nine made multiple comments. Most comments praised the clear, consistent guidelines ( $n = 5$ ); three noted increases in time and paperwork; three detailed the difficulties of phone triage or requested more education; and two related to patient access and follow up.

Our small study raises important issues for rural communities internationally. While the perception of improved access for the community is congruent with studies elsewhere<sup>4,5</sup>, our study's finding of increased workload on nursing staff was not reported in these previous studies. This extra workload has important implications for health planners considering such a development.

There are a number of ways this workload concern could be addressed by communities considering implementing a telephone triage system. Simulations could serve as an engaging means of discussing systems issues<sup>6</sup>. A simplified checklist triage form would decrease telephone documentation. Recording phone consultations would supplement documentation and could be used for training purposes<sup>7</sup>. Providing cordless telephones and more computer stations, with triage protocols and forms, should allow staff to be more mobile between calls. Asynchronous communications using technologies such as email, web-based communications and telemedicine could also be considered. However, there are concerns from healthcare providers about being overwhelmed<sup>3,8</sup>, privacy issues are still problematic, and only approximately half of the people in rural communities have access to email or the web at their homes or close community venues<sup>9</sup>.

In conclusion, we suggest that our experience at KDH should encourage other rural health services to consider an after-hours telephone triage system. It can extend the impact

of local healthcare services, but care must be taken to consider ways to minimise the possible increase in workload of nursing staff.

It may also be of interest to your readers that this staff-initiated quality improvement project was carried out by visiting medical students as part of a rural health experience course designed to expose future doctors to rural healthcare issues. Such partnerships may improve the capacity and quality of rural healthcare systems while connecting medical students to workforce-short rural communities.

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