

3rd Consensus Conference on Rapid Response Systems

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Background:

This is a summary of the report from the 3rd Consensus conference on Rapid Response Systems (RRS). The first consensus on RRS introduced the concept and the definition of such a complex system (1). The second consensus did focus on the detection of deteriorating patients in the ward (2). The aim of the 3rd consensus, which was done in Manchester on the 7th and 8th of July 2018, was to create an acceptable standard of measuring effectiveness and efficiency of RRS and their components for clinical purposes (and related research). The participants were invited from around the globe to represent different fields of medicine as well as nursing and patients'/families' organisations.

Introduction:

There is an ongoing debate as to whether RRS, utilising Medical Emergency Teams (MET), outreach teams or other teams, have a beneficial effect on important outcomes- notably unexpected mortality, cardiac arrest and unplanned ICU admission. A summary of RRSs main components and rationale is presented in table 1. Unfortunately, there are some confounding factors in the current analysis of data related to the performance of RRS which make results of clinical trials nearly impossible to compare. Moreover, since the definition of the RRS, during the first consensus conference (1), no research has focused on metrics. The medical community is increasingly sceptical because of the number of negative studies presented (3-5). This is a major barrier for the implementation of RRS in some countries. A panel of experts in patient safety, RRS, as well as patient advocates agreed on metrics following a review of the current literature, discussion on reasons why trials still have negative results, methods for data collection and management, goals for future research and outcome measure for the adult population. In the current economical climate physicians in Europe face several obstacles to work with a system that has not objectively proven benefits. Country variability makes also very difficult to set a standardised Business plan to compare costs and benefits of such a system. New metrics could facilitate such a challenge taking into account financial elements and looking at efficiency of the system.

Objectives:

The 3rd Consensus conference has been planned and prepared since the beginning of the 2018 and has been finally completed on the 7th and 8th of July.

Methods:

Participants were invited having expertise in clinical healthcare practice, or being a representative of an organization with a stake in the findings, or expertise in patient

safety, or being a member of a governmental healthcare agency. The target audience for the product of the conference includes clinicians and hospital leaders, manufacturers of monitoring equipment, regulatory agencies and governmental policy makers, and funders for healthcare research. The work was divided in 3 main periods: a pre-consensus, consensus and post consensus phase.

Pre-Consensus. The ‘team-lead’ of each work stream contacted participants and proposed work plans and dates for a series of conference calls. All pre-consensus activities were based on consensus methodologies (6).

Consensus: The participants were divided in 3 groups and they met face to face in Manchester on the 7th and 8th of July 2018. The groups worked separately as well as jointly to develop the final metrics. The entire panel was re-convened and the results of each of the work-groups were presented and discussed. The participants agreed on each metrics by the end of the second day. Metrics were structured using a standard template and graded as: essential, suggested or optional.

Post-Consensus: The results were presented and discussed in Manchester. The output of the meeting was presented at the international conference on the 9th and 10th of July. The work stream leads summarized their learning and shared those with the panel. Two more rounds of Delphi modify discussions are planned before the final definition and publication. Results will be simplified and presented in a standardized format to make sure these can be easily applied. A paper will be submitted to a peer reviewed paper in the next 3-6 months.

Conclusions:

The 3rd Consensus Conference on RRS has been completed in 2018. Main work-stream have developed and the entire panel has defined a series of metrics which could be either essential, suggested or optional. These will allow RRS to be best understood and measured in their effectiveness and efficacy. Results have been presented and will be published at the end of the Delphi modified process which is currently on going.

References:

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Table 1.

RRTs and RRSs are the first clinician-led, patient-centred, organisation-wide initiatives aimed at making hospitals safer.

Ward teams do not reliably recognise instability. SAEs are usually preceded by objective signs of deterioration, often for several hours.

Systematic review and meta-analysis indicated that RRSs reduce In-Hospital Cardiac Arrests and possibly hospital mortality in the adult and paediatric population.

RRSs may indirectly improve patient care by: a) supporting and educating ward staff, b) triaging deteriorating patients who are appropriate for ICU, c) enabling audit and learning about at-risk and deteriorating patients, thereby improving care processes.

RRSs facilitate communication across departments and pathways and encourage the development of new technology for patient catered care and detection and monitoring of at-risk and deteriorating patients.

Table1: Summary of RRSs main components and rationale