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Prioritising outcomes measures for ambulance service care: a three stage consensus methods study

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57th Annual Scientific Meeting

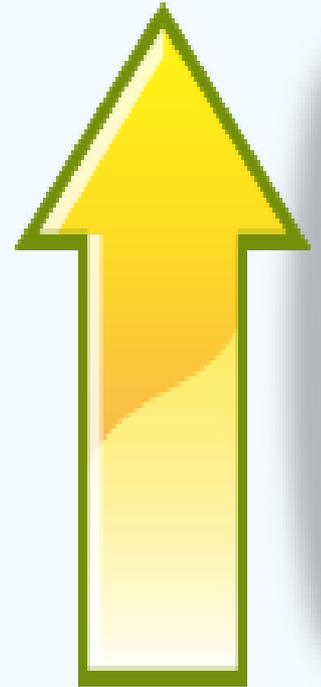
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Summary

- Background to the project
- Current ambulance service quality and performance measures
- What do ambulance service stakeholders and PPI representatives think we should measure?
- What is important to patients?
- Delphi study

Background

- 4.4 million callers in 2000-01, 9.09 million in 2012-13
- Types of patients and needs changing
- Historically response times measured as a marker of quality
- Difficult to measure 'outcomes' – why?





Pre-hospital Outcomes for Evidence Based Evaluation

- 5 year NIHR programme grant
- Develop better ways of measuring the performance, quality and impact of ambulance service care
- Systematic reviews of actual and aspirational outcome measures
- Prioritisation of identified outcomes using consensus event, online survey and Delphi
- Create linked ambulance service/other services data set
- Use outcomes to develop predictive models
- Provide better information about effectiveness and quality of care

Current ambulance service quality and performance measures

- Systematic review of current measures
- 405 measures/151 papers
 - Patient outcomes 13%
 - Survival and time 60%
- Why measure time and survival?
 - Easy to measure
 - Easy to record
- Issues
 - Only applicable to a small patient group
 - No information about quality of care or patient viewsWhat about clinical need, patient experience or effectiveness?

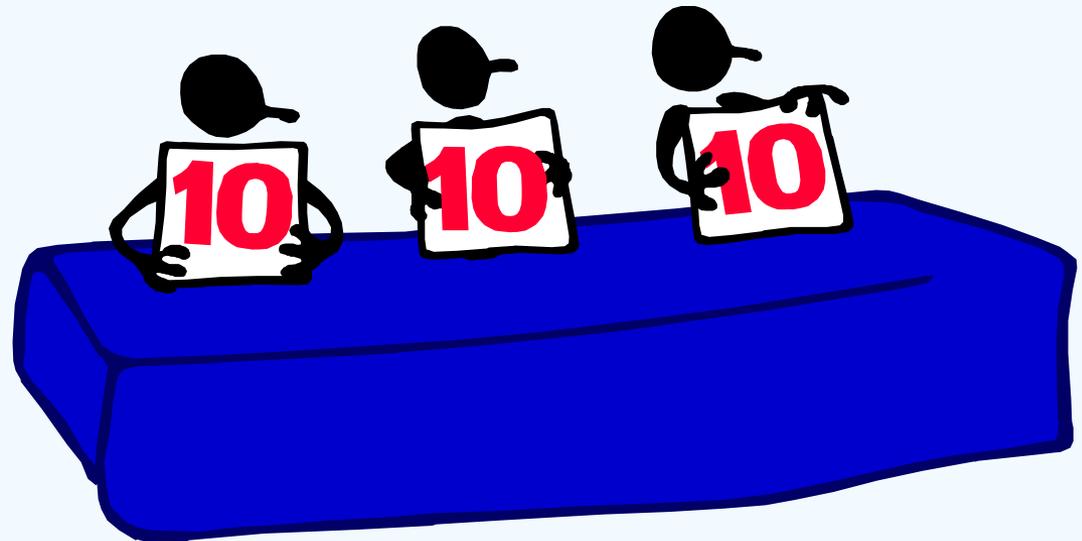


Review of policy documents

- Current measures
 - Response time the predominant measure
 - Focus on a few critical conditions
 - Patient outcomes: Survival/mortality measures and satisfaction
- Aspirational
 - More patient outcome based measures
 - Balanced score card approach
 - a suite of measures rather than single measures
- Why is it difficult?
 - Lack of "joined up" information is a key limiting factor in developing more outcome based measures
 - Little effort on developing generic measures that are applicable on a service population rather than condition basis.

Prioritising outcome measures using consensus methods

- Large number of time measures – prioritised using an online form
- Consensus event – small group discussion and live vote of key measures and concepts from literature
- Delphi survey



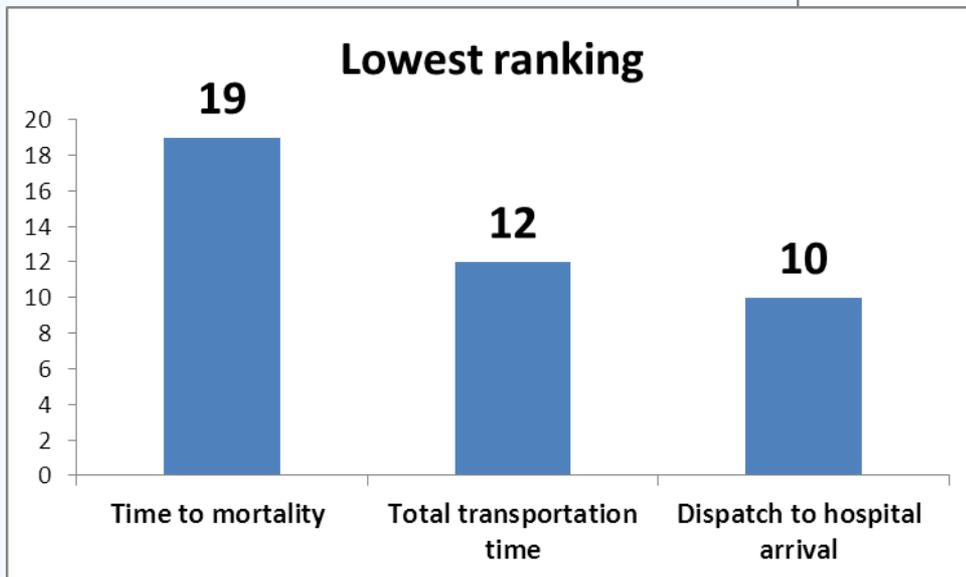
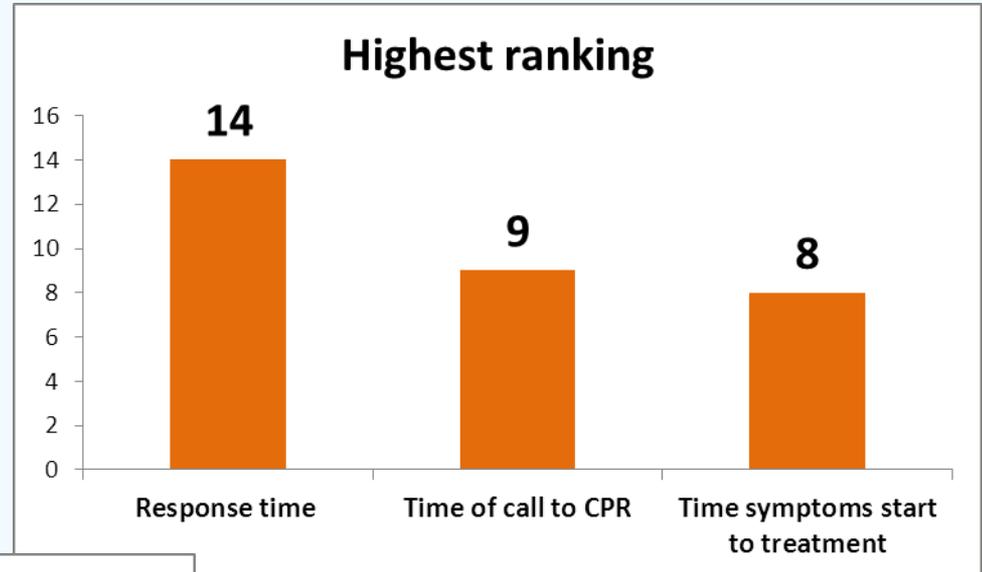
The issue of time

- Most commonly collected and reported measure
- 23 different time interval measures
- Most common is call to scene
- Recognised as having little relevance or value
- Online survey: which time measures are most useful?



Time measures online survey

- 28 responses (48%RR)
- Most important and least important measures



- Highest ranking measures taken forward into a Delphi study

Consensus Event

Aim – to prioritise potential measures for measuring ambulance service quality and performance

- 1 day event, small group discussions, live votes
 - Ambulance service
 - Patient and public
 - Commissioners
 - Policy makers
 - Academic research

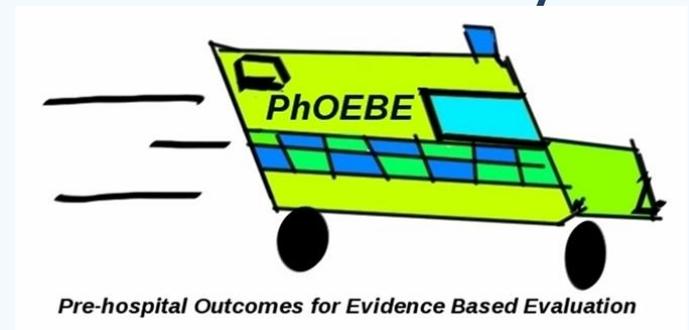


Consensus event results

Rank	Service/Operational	Essential (n%)
1	Completeness and accuracy of patient records	35 (83)
2	Over triage and under triage rates	31 (73)
3	Proportion of calls treated by most appropriate service	30 (71)
	Patient management	
1	Accuracy of dispatch decisions	36 (86)
2	Accuracy of call taker identification of different conditions/ needs	34 (81)
3	Compliance with end of life care plans	31 (74)
	Patient outcomes	
1	Pain management and symptom relief	32 (76)
2	Patient experience	21 (50)
3	Return of Spontaneous Circulation (ROSC)	18 (43)

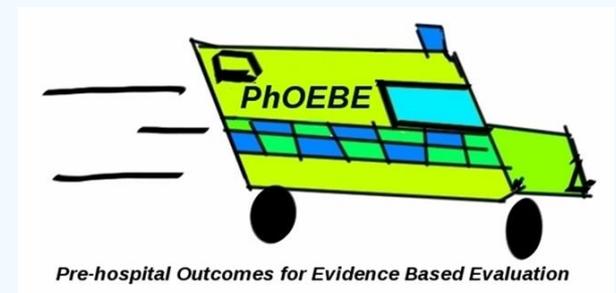
Consensus Event conclusions

- Accuracy of different types of decision making and compliance with management protocols predominated as essential
- Pain management the most important patient measure
- Management of end of life care was identified by participants
- The electronic voting system which provided instant real time feedback was well received by participants



Patient perspective

- Qualitative interviews for patient experience measures
 - 16 interviews with ambulance service users
- Key findings
 - Users feel reassured
 - Waiting time is acceptable
 - Staff who listen and offer clear explanations to users
 - Staff who are caring and respectful
 - Staff who are thorough



Delphi study development

- Delphi survey to further refine and prioritise the measures
- Highest ranking measures from the consensus event and time measures online survey
- Also incorporates the findings from patient interviews
- Some high priority concepts difficult to measure or have multiple measures e.g. patient safety, accuracy of dispatch decisions
- Link back to systematic review data to identify measurement methods

Conclusions



Pre-hospital Outcomes for Evidence Based Evaluation

- Information from multiple sources about potential measures and their importance
- Key themes: accuracy of processes, compliance
- Patient outcomes: patient experience, pain and patient safety
- Further refined in Delphi study – September 2013