Research Brief (09/1007)
Call for proposals: Patient safety in healthcare organisations

1. Introduction

This call for proposals is issued within the priority areas workstream of the NIHR service delivery and organisation (SDO) research programme. We have allocated approximately £2 million to invest in a portfolio of research projects concerned with the organisational dimension of patient safety in healthcare.

The NIHR Service Delivery and Organisation programme is funded by the NIHR, with contributions from WORD in Wales. The NIHR SDO programme improves health outcomes for people by:

- Commissioning research and producing research evidence that improves practice in relation to the organisation and delivery of health care, and
- Building research capability and capacity amongst those who manage, organise and deliver services – improving their understanding of the research literature and how to use research evidence.

The primary audience for SDO commissioned research is decision makers in the NHS in England and Wales – particularly managers and leaders in NHS organisations. We focus our research commissioning on topics and areas where we think research evidence can make a significant contribution to improving decision making, and so to improving the organisation and delivery of healthcare to patients.

Further information on the NIHR SDO programme, including a list of past, current and recently commissioned projects, can be found on the SDO website: www.sdo.nihr.ac.uk

2. Background to this call

Ensuring the safety of everyone who comes into contact with health services is one of the most important challenges facing health care today. Patients expect and are entitled to the safest possible care[1].

It is estimated that one in ten patients who receive health care will suffer from preventable harm. 850,000 adverse events are thought to occur in UK hospitals each year. Additional hospital stays cost £2 billion a year, with negligence claims amounting to a further £400 million a year. The National Audit Office (NAO) 2008 found that the cost to NHS Trusts of patient safety incidents ranged from £88,000 to £44,000 per year [2]. Adverse events have a cost to both patients and staff in terms of mental and physical distress along with an additional cost to NHS and to the economy in terms of lost earning capacity.

Over the last decade patient safety has been prominent on the healthcare agenda, prompted initially by two seminal documents published in 2000: The report of the US Institute of

[1] Care Quality Commission retrieved October 2009, available at http://www.cqc.org.uk/guidanceforprofessionals/healthcare/allhealthcarestaff/managingrisk/patientsafety.cfm
[2] National Audit Office (2008). Patient safety. London: The Stationery Office

Medicine "To Err is Human" [3], and in the UK the report of a CMO expert group "An Organisation with a Memory" [4]. The following year "Building a Safer NHS for Patients"[5], set out the Department of Health's plan for placing patient safety in the context of the NHS quality programme and led to the establishment of a national system for reporting and learning from adverse incidents involving NHS patients, to be run by a new agency (the National Patient Safety Agency) and supported by an 'open, no-blame reporting culture'. In response to a critical report from the NAO[6] a further DH document "Safety First" [7] made recommendations designed to accelerate the pace of change in the NHS in England. It also led to the launch of a Patient Safety First Campaign for England in 2008 (and to an equivalent campaign – the 1000 Lives Campaign – in Wales).

In parallel with these official developments, the Health Foundation (a charity that works to improve the quality of healthcare) launched the Safer Patients Initiative in 2004, initially in four NHS acute organisations that undertook, with the support of the US Institute for Healthcare Improvement, to implement a package of evidence-based clinical practices through application of continuous quality improvement and process control techniques and development of safety culture. In 2006 the initiative was expanded to another 20 hospitals.

In 2008, Lord Darzi's report "High Quality Care for All"[8] made quality the prime focus of the NHS and identified patient safety as its 'first dimension'. This message has been reinforced by recent reports from the Care Quality Commission (CQC) [9] [10] and the House of Commons Health Committee[11] which highlighted the key responsibilities of NHS trust boards (commissioners and providers) in this area.

"An Organisation with a Memory"[4] recommended a programme of research into adverse events in the NHS, drawing upon work undertaken in other sectors, and this was picked up in "Building a Safer NHS for Patients"[5] which outlined a comprehensive research strategy. NIHR has invested over £10 million in patient safety research through a number of specially designated research centres[12] , and through a programme of over 38 published patient safety research projects[13] . As a result there is now a significant amount of relevant research literature, some of it specific to healthcare, some generic or relating to other sectors but still relevant to healthcare. However significant gaps remain, particularly in relation to the organisational dimensions of patient safety. For example:

---

[3] Institute of Medicine (1999) *To Err is Human: Building a safer health system.* Washington D: institute of Medicine

[4] Department of Health (2000) *An Organisation with a Memory*, London: The stationary Office

[5] Department of Health (2001), Building a Safer NHS for Patients: implementing an organisation with a memory, (London: Department of Health)

[6] A safer place for patients: Learning to improve patient safety. NAO 2005.

[7] Department of Health, (2006), Safety First: a report for patients, clinicians and healthcare managers (London: Department of Health)

[8] High Quality Care For All (2008), available at http://www.dh.gov.uk/prod_consum_dh/groups/dh_digitalassets/@dh/@en/documents/digitalasset/dh_085828.pdf

[9] Safely does it: Implementing safer care for patients (2009), available at http://www.cqc.org.uk/_db/_documents/Safely_does_it_200903274336.pdf

[10] Safe in the knowledge: How do NHS trust boards ensure safe care for their patients? (2009), available at http://www.cqc.org.uk/_db/_documents/Safe_in_the_knowledge_200903273451.pdf

[11] House of Commons Health Committee. Patient Safety. 6th report 2008/9. 3 July 2009. House of Commons.

[12] NIHR Research Centres for Patient Safety & Service Quality, available at http://www.nihr.ac.uk/infrastructure/Pages/infrastructure_research_centres_for_nhs_patient_safety_and_service_quality.aspx

[13] Patient Safety Research Portfolio (PSRP), available at http://www.haps.bham.ac.uk/publichealth/psrp/index.shtml

- Although some work has been undertaken to evaluate recent initiatives in the NHS eg on the Safer Patients Initiative[14] [15] , there is considerable scope for further work of this kind, and into the design of effective interventions to reduce errors in healthcare[16] [17] [18].

- While the concept of safety cultures or climates has received considerable attention, Nieva and Sorra[19] found that though safety culture assessments are useful tools for measuring organisational conditions that lead to adverse events, more evidence is needed about the validity of such tools and how to use assessment data to initiate and sustain safety culture change.

- While risk assessment methods have developed, Battles and Lilford[20] concluded that no perfect methods for identifying risks in patient safety exist and that the use of combinations of methods using archival records, event reporting, observation and risk assessment methods is required to identify risk.

- After several years of investment in patient safety in the US, Altman, Clancy and Blendon[21] found an absence of a consensus on what specific efforts should be the focus of safety improvement, including how best to collect and report information on the quality and safety of hospitals and health care providers;

Some of these findings may suggest that more attention is needed to the organisational environment for patient safety improvement. Work by Ovretveit[22] [23] suggests that a patient safety strategy is more likely to be successful if it is chosen with knowledge of alternative approaches, adapted to the situation, reviewed and adjusted to changes, which should be supported by committed management. A policy and financial context that rewards greater safety and quality is required. Active and transparent management of the balance of quantity, cost and quality of service should also be rewarded.

The SDO programme has commissioned some work on safety in the past - for example a project on measuring and assessing organisational culture change and creating safe places for patients and staff (SDO Project *08/1501/92)*[24] concluded that further research was needed on:

- organisational and individual factors that foster, maintain quality and safety
- CEO leadership roles

---

[14] Benn, Jonathan; Burnett, Susan1; Parand, Anam2; Pinto, Anna2; Iskander, Sandra3; Vincent, Charles4, Perceptions of the impact of a large-scale collaborative improvement programme: experience in the UK Safer Patients Initiative, Journal of Evaluation in Clinical Practice, Volume 15, Number 3, June 2009 , pp. 524-540(17)

[15] Dixon-Woods M, Suokas A, Pitchforth E, Tarrant C. An ethnographic study of classifying and accounting for risk at the sharp end of medical wards. Social Science and Medicine (accepted April 2009), available at http://www.kingspssq.org.uk/EasySiteWeb/getresource.axd?AssetID=7798&type=full&servicetype=Attachment

[16] Westwood M**,** Rodgers M**,** Sowden A (2002). Patient safety: a mapping of the research literature. York: NHS Centre for Reviews and Dissemination; 2002.

[17] Walshe, K. and Boaden, R. (eds) (2005), Patient Safety Research into Practice, (Maidenhead: Open University Press)

[18] Sanders, J. and Cook, G. (eds) (2007), The ABC of Patient Safety, (Oxford: Blackwell)

[19] Nieva,V.F. and Sorra, J. (2003), 'Safety Culture Assessment: a tool for improving patient safety in healthcare organizations', Quality Safety Health Care, 12(ii), 17-23

[20] Battles, J.B. and Lilford, R.J. (2003), 'Organizing patient safety research to identify risks and hazards', Quality Safety Health Care, 12(ii), 2-7

[21] Altman, D.E., Clancy, C. and Blendon, R.J. (2004), 'Improving Patient safety – five years after the IOM report', New England Journal of Medicine, 351(20), 2041-2043

[22] Ovretveit, J (2003) What are the best strategies for ensuring quality in hospitals? Health Evidence Network.

[23] Ovretveit, J. (2007), Economics and effectiveness of interventions for improving quality and safety of health care - A review of research, (Stockholm: Karolinska Institute Medical Management Center)

[24] McKee L (2009) Measuring and assessing organisational culture change and creating safe places for patients and staff. Available at http://www.sdo.nihr.ac.uk/sdo922005.html

- middle management roles
- patient experiences, views of patient safety
- stress amongst nursing staff

3. Remit of this call: main topics identified

The SDO programme now wishes to commission research on aspects of patient safety particularly relating to organisational environments, structures, systems and cultures, consistent with the mission and focus of the SDO programme set out in section 1.

We set out below four areas in which we are now inviting calls for proposals. In these areas we want to complement, build upon and develop the themes identified in previous research programmes on patient safety. Most recent work has focused on acute care settings, and studies will be particularly welcome that examine patient safety in other settings including the "spaces between" organisations, examining safety on a patient's journey between professions, services and sectors. There is still scope for work that includes examining what patient safety can learn from experience outside the health sector.

The SDO programme is particularly interested in proposals for research in the following four topic areas:

3.1 Translating knowledge about patient safety into service delivery

Despite a proliferation of methods to identify risk and of interventions designed to improve safety, these are often not routinely applied in practice. Further research is needed on the organisational effectiveness of different interventions and on the factors that influence this; and to explore the facilitators and barriers encountered in 'spreading' interventions that have worked in one organisation to others, and of sustaining them so that improvements in safety are enduring. As well as evaluating the impact of specific initiatives locally and nationally, research is needed on themes such as:

- Organisational, management and governance infrastructures that contribute to a safe environment and the roles of key groups eg Trust Boards, CEOs and other executive leaders, clinical leaders, middle management
- How to develop, embed and sustain a safety culture/climate in healthcare organisations
- How organisational and professional capacity to promote patient safety practices can be developed and sustained

3.2 Patient/user involvement in safety improvement

Many safety improvement activities are professionally led and constructed in ways which allow little scope for patient or user engagement in safety improvement. An important question is how best to involve patients in tackling patient safety issues. The WHO's World Alliance for Patient Safety highlights the importance of developing policy and practice for patient involvement[25]. Research is needed on the different ways of involving patients, and the roles that patients can play in identifying safety problems and improving safety. Some key questions include:

[25] World Health Organization (2008), World Alliance for Patient Safety. Forward Programme. 2008-2009, at http://www.who.int/patientsafety/information_centre/reports/Alliance_Forward_Programme_2008.pdf

- What are the most appropriate and effective ways to involve service users in improving safety, and what benefits does user involvement bring in terms of improved safety
- Are there some service areas, patient groups, or care processes in which patient or user involvement is particularly necessary, effective or worthwhile in improving safety
- What tools or systems exist for developing service users' involvement in patient safety, or for measuring and assessing user involvement or engagement in safety improvement

3.3 Financial costs and benefits and trade-offs in patient safety

The high costs of adverse events have been established through research and were highlighted in section 2, but there is less direct evidence of the cost effectiveness of patient safety interventions. In some cases improving patient safety involves trade-offs with other dimensions of quality and with cost-reduction and productivity targets. Research is needed which explores the financial costs and benefits of patient safety interventions and programmes, and which examines the different perceived or actual trade-offs or conflicts which may impact on safety improvement. Possible questions include:

- What are the financial costs and benefits of providing safer and more reliable patient care, and how can these costs and benefits be measured and demonstrated for patient safety interventions and programmes
- What trade-offs need to be managed in efforts to ensure or improve patient safety, and where might increased costs or reduced productivity result from improved patient safety

3.4 Boundaries between care processes, services and organisations

Much attention has been given to improving patient safety within care processes, service or organisations, but many safety problems may result when patients cross boundaries between these processes or entities. The handover or transition may present particular risks, in terms of the need for clear responsibility, good communication and effective interprofessional and interorganisational collaboration. Patient safety improvements may require changes which cannot be simply implemented by one service area or organisation, but which require new ways of working between professions, organisations and services.. Research is needed on how to improve patient safety in the "spaces between" care processes, services and organisations. Sample questions include:

- How significant are the safety problems or adverse events which result from boundary spanning or crossing in care processes, services and organisations, and what kind of safety issues are particularly important in terms of their incidence or impact
- What patient safety improvement strategies or techniques can be used to tackle these patient safety problems, and to reduce the risks of boundary spanning or crossing?

4. Process for proposal selection

The NIHR SDO programme is seeking outline proposals in the themes set out above. The duration of the projects will have to be justified. Applicants are reminded that timeliness

will be highly valued. Both short (up to 1 year) and medium (up to 3 years) term projects will be considered. The latter will be expected to provide regular interim reports.

The NIHR Service Delivery and Organisation programme is funded by the NIHR, with contributions from WORD in Wales. Researchers in England and Wales are eligible to apply for funding under this call. Researchers in Scotland and Northern Ireland should contact their Health Department Research and Development Office and Health and Social Care Research & Development, Public Health Agency respectively if they wish to discuss funding opportunities for this type of research.

Whilst we have not set a maximum cost for projects, value for money will be scrutinised and all costs must be justified. It should be noted that the overall budget for this call set out in section 1 is approximately £2 million, from which we anticipate funding a diverse portfolio of projects. Applicants should be aware that changes of costs between outline and full proposal will have to be fully explained. We therefore encourage applicants to be as realistic as possible when costing their outline proposals.

Applications for this call will be assessed in two stages. Outline proposals will be checked for eligibility against the general remit of the programme and the specific remit of this commissioning brief, and then reviewed by the Priority Areas Panel. The primary criterion against which the Panel assesses outline proposals is that of **NHS need – in other words, whether the proposed research will be useful to research users in the NHS, and is likely to contribute to improving decision making**. It will use four main criteria to make this judgement:

- Relevance of the proposed research to this call for proposals.
- Relevance of the proposed research to the needs, interests, current and future challenges for the management community in the NHS.
- Likelihood that the proposed research will produce findings that are timely, useful and capable of application by the management community in the NHS.
- Likelihood that the proposed research will promote the greater engagement of the academic community of researchers, the practice community of healthcare managers, and the development of links between academic institutions and NHS organisations.

Successful outline proposals

Applicants whose proposals are shortlisted will be asked to develop a full proposal for assessment by the SDO Commissioning Board meeting in September 2010. This Board's primary concern is the **quality of the proposed research**. It uses two main criteria to make this judgement:

- Scientific rigour and quality of the proposed research, and the expertise and track record of the research team.

- Value for money of the proposed research, taking into account the overall cost and the scale, scope and duration of the work involved.

5. General guidance for applicants

Our main concern is to commission research which is well-designed, will be effectively carried out by the research team, and will provide findings that meet the needs of the

NIHR SDO programme and the NHS management and leadership community it serves. In order to achieve this, we encourage applicants to take the following points into account:

- **Theoretical framing and empirical methods.** Issues should be addressed in a way likely to lead to the wide applicability of findings. Applicants should clearly demonstrate links between theoretical and empirical work. Large projects will need various methods, including both qualitative and quantitative approaches matched to study questions with clear understanding as to how findings from different empirical approaches will be integrated.

- **Research team makeup and expertise**. Projects are likely to use broad teams with significant input from diverse disciplines with a commitment to developing robust inter-disciplinary approaches. Applicants need to show that they will commit appropriate time and effort to the project. The principal applicant should generally be the person who has contributed most to the intellectual and practical development of the proposal and who will take responsibility for its implementation. The NIHR SDO programme encourages inclusion of an element of research capacity-building.

- **Public involvement**. It is a core concern of the SDO programme that all commissioned projects should pay appropriate attention to the needs and experiences of all relevant stakeholders (including local communities, lay people, service users, carers, minority ethnic communities as well as healthcare practitioners and managers) during the design, execution and communication of the research. Proposed projects should be explicit in communicating how the proposed work has potential implications for service delivery that could lead to enhanced public and community engagement.

- **Research governance**. Applicants should ensure that their proposal complies with the Research Governance Framework. Successful applicants will be required to provide proof of research ethics committee approval for their project, if this is required.

- **Costs and value for money.** Project costs will be carefully scrutinised and must always be well justified. NIHR programmes currently fund Higher Education Institutions (HEI) at a maximum of 80% of Full Economic Cost (except for equipment over £50,000 – 100%). For non-HEI institutions, NIHR may fund 100% of costs. However, the NIHR SDO programme reserves the right to award a grant for less than this maximum and for less than the amount sought by applicants.

6. Dissemination and knowledge mobilisation

Applicants should be able to demonstrate that although the findings should be applicable to the current situation, these should also be sustainable beyond a 12-month period. In outlining their research plans, the applicants should make clear how findings will be communicated, particularly to service audiences.

Applicants should outline plans for conference, seminar and other forms of dissemination to go alongside written communications. The proposed work should be designed and delivered in a way that is helpful to NHS decision makers. Projects will be expected to deliver interim reports on progress and provisional findings (normally every six months).

Applicants will be expected to deliver a full report detailing all the work undertaken and supporting technical appendices (up to a maximum 80,000 words), and an executive summary (500 words) as well as an abstract.

7. Application process and timetable

Any questions, queries or requests for clarification in relation to this call for proposals should be sent by email to sdofund@southampton.ac.uk with the reference number and title of the call for proposals as the email header. Applicants should be aware that while every effort will be made to respond to enquiries in a timely fashion, these should be received at least two weeks before the call closing date.

The process of commissioning will be in **two stages** and applicants should submit **outline proposals** via the SDO website by **1pm** on **18 March 2010.** No late proposals will be considered. No paper-based submissions will be considered.

Applicants will be notified of the outcome of their outline application in May 2010.

Shortlisted applicants will be invited to submit a full proposal via the SDO website (a link will be sent to shortlisted applicants). Applicants will be notified of the outcome of their full proposal application in October 2010. Please note that these dates may be subject to change.