AUSTRALIAN COMMISSION ON SAFETY AND QUALITY IN HEALTH CARE

On the Radar

Issue 143
9 September 2013

On the Radar is a summary of some of the recent publications in the areas of safety and quality in health care. Inclusion in this document is not an endorsement or recommendation of any publication or provider.

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On the Radar
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Free public lecture

"The Third Healthcare Revolution" Professor Sir Muir Gray
Monday 30 September 2013

"Healthcare's perfect storm - rising need and demand with no more resources. Welcome to the Third Healthcare Revolution!"

The Australian Commission on Safety and Quality in Health Care invites you to a public lecture by Professor Sir Muir Gray – a pioneer in the evidence-based health care movement.
Sir Muir believes we are in the midst of a Third Healthcare Revolution driven by citizens, knowledge and the internet.
Despite the significant clinical advances of the last 50 years, health services are faced with the same persistent problems: patient harm, waste, unwarranted variation, inequity, and failure to prevent the preventable. Health services are also faced with the new challenges of rising demand and resource constraints.

Join us to hear Sir Muir's vision for the Third Healthcare Revolution, and how it can overcome these challenges.

Time: 5:30pm to 6:30pm (refreshments from 5:00pm)
Venue: Rydges World Square, 389 Pitt Street, Sydney
RSVP: By Friday, 20 September 2013 by emailing ACSQHCevents@safetyandquality.gov.au

For further information see http://www.safetyandquality.gov.au/events/free-public-lecture-the-third-healthcare-revolution-sir-muir-gray/

Journal articles

Patient safety without borders: measuring the global burden of adverse events
Adhikari NKJ
BMJ Quality & Safety 2013 [epub].

Notes	This editorial discusses a forthcoming item in *BMJ Quality and Safety* that attempts to estimate the global extent of adverse events. Adhikari notes that in high-income countries the estimate of 9% of hospital admissions are complicated by an adverse event, of which around 44% may be preventable has proved fairly consistent. He goes on to discuss the new paper by Jha and colleagues whose "main findings are that approximately **43 million adverse events occur each year around the globe** and **cause** a staggering **23 million associated disability-adjusted life years** (DALYs, the sum of years of life lost and years lost to disability)". Two-thirds of these occur in low and middle income countries. These figures "suggest the **preventable adverse events** represent **a leading cause of morbidity and mortality worldwide**." Adhikari notes some of the limitations of the study, some issues that it raises and describes some possible future directions.
DOI	http://dx.doi.org/10.1136/bmjqs-2013-002396

Unexplained variation in hospital caesarean section rates
Lee YY, Roberts CL, Patterson JA, Simpson JM, Nicholl MC, Morris JM, et al.
Medical Journal of Australia 2013;199(5):348-353.

Notes	The issue of variation, particularly unexplained or unwarranted variation, is garnering increasing attention. It is known that the rate of some procedures does vary markedly between countries, including the rate of caesarean sections (CS). The OECD is coordinating a project into medical practice variation that examines variation of some procedures within a number of OECD countries. The authors note that variation may potentially be attributable to differences in women's risk profiles, preferences and expectations, and local maternity care practices. This paper examined hospital CS rates in New South Wales, adjusted for casemix. Recognising that CS rates in Australia increased from 23% to 32% over 2000 to 2009 and that vary by jurisdiction ((from 28% in the ACT to 33% in Queensland and Western Australia), between public and private hospitals (28% and 43%, respectively), and among individual public hospitals, this study sought to examine that variation more closely by undertaking a population-based record linkage study of births in 81 hospitals in New South Wales in 2009–2010 that used the Robson classification to categorise births.

	The authors report that the **overall CS rate was 30.9%,** ranging from **11.8% to 47.4% among hospitals**. They report that the "three groups contributing most to the overall CS rate all comprised women with a single cephalic pregnancy who gave birth at term, including: those who had had a previous CS (36.4% of all CSs); nulliparous women with an elective delivery (prelabour CS or labour induction, 23.4%); and nulliparous women with spontaneous labour (11.1%). After adjustment for casemix, marked unexplained variation in hospital CS rates persisted for: nulliparous women at term; women who had had a previous CS; multifetal pregnancies; and preterm births. **If variation in practice was reduced** for these risk-based groups **by achieving the "best practice" rate**, this would **lower the overall rate** by an absolute reduction of 3.6%, **from 30.9% to 27.3%.**"
DOI	http://dx.doi.org/10.5694/mja13.10279

Observation charts with overlapping blood pressure and heart rate graphs do not yield the performance advantage that health professionals assume: an experimental study
Christofidis MJ, Hill A, Horswill MS, Watson MO
Journal of Advanced Nursing 2013 [epub].

Notes	This paper reports on how accurately healthcare workers can recognise clinical issues on observation charts depending on how those observations are graphed. It has been suggested that whether overlapping blood pressure and heart rate graphs can aid in recognising clinical deterioration, including by the use of a visual cue called the 'Seagull Sign' to detect physiological abnormalities. This paper reports on a study investigating whether such overlapping graphs do improve chart-users' ability. The authors report that across 64 experimental trials, participants from all the study groups **responded faster and made fewer errors when blood pressure and heart rate observations were graphed separately**, especially when a track-and-trigger system was present. Even for 'Seagull-trained' participants viewing 'Seagull Sign available' cases, no advantage of overlapping graphs was found.
DOI	http://dx.doi.org/10.1111/jan.12223

For information about the Commission's work on recognition and response to clinical deterioration, including observation and response charts, see http://www.safetyandquality.gov.au/our-work/recognition-and-response-to-clinical-deterioration/

Delayed medical emergency team calls and associated outcomes
Boniatti M, Azzolini N, Viana M, Ribeiro B, Coelho R, Castilho R, et al.
Critical Care Medicine 2013 [epub]

Notes	This paper reports the results of a single-centre observational study undertaken to determine if there is an association between delays in calling the medical emergency team (MET) and 30 day mortality. Delays of greater than 30 minutes occurred in 21.4% of the 1,148 patients included in the study. 30 day mortality for these patients was significantly higher than among patients receiving timely activation of the MET (61.8% v 41.9%). **Delayed MET calls** remained significantly associated with **higher mortality** after multivariate analysis.
DOI	http://dx.doi.org/10.1097/CCM.0b013e31829e53b9

The medical emergency team call: A sentinel event that triggers goals of care discussion
Smith R, Hayashi V, Lee I, Navarro-Mariazeta L, Felner K.
Critical Care Medicine 2013 [epub]

Notes	This US study provides an additional perspective on the role played by medical emergency teams (MET) in making resuscitation decisions. Time point analysis was used to evaluate the impact of MET implementation on the placement and timing of do-not-resuscitate orders. MET implementation was associated with a significant change in the trend of do-not-resuscitate orders but did not change overall hospital mortality. The authors conclude that **MET activation and transfer to critical care are sentinel events which trigger consideration of goals of care and frequently result in a transition to a palliative focus**.
DOI	http://dx.doi.org/10.1097/CCM.0b013e3182a27413

Jha V, Winterbottom A, Symons J, Thompson Z, Quinton N, Corrado OJ, et al
Patient-led training on patient safety: A pilot study to test the feasibility and acceptability of an educational intervention
Medical Teacher 2013;35(9):e1464-e1471.

Notes	Greater patient engagement and involvement in health care is seen as a way of enhancing the safety and quality of care. The nature and extent of that engagement can vary, from being more engaged in one' own care to having patients involved in facility design and operation. This paper describes a British pilot patient safety training programme that put patients to the fore. In this pilot "**patients and/or carers who had experienced harm** during their care **shared narratives of their stories with trainees**; this was followed by a focused discussion on patient safety issues exploring the causes and consequences of safety incidents and lessons to be learned from these." The authors report that intervention was successfully implemented into an existing training programme and found acceptance amongst the patients and trainees. The intervention is to be further studied in randomsised control trial.
DOI / URL	http://dx.doi.org/10.3109/0142159X.2013.778391 http://informahealthcare.com/doi/full/10.3109/0142159X.2013.778391

BMJ Quality and Safety online first articles

Notes	*BMJ Quality and Safety* has published a number of 'online first' articles, including: • **Sign-out** snapshot: cross-sectional evaluation of written sign-outs among specialties (Amy R Schoenfeld, Mohammed S Al-Damluji, L I Horwitz) • **Cognitive debiasing** 2: impediments to and strategies for change (Pat Croskerry, Geeta Singhal, Sílvia Mamede) • Building a safer foundation: the Lessons Learnt **patient safety training** programme (Maria Ahmed, Sonal Arora, Stephenie Tiew, Jacky Hayden, Nick Sevdalis, Charles Vincent, Paul Baker) • **Improving outcomes for patients with type 2 diabetes** using general practice networks: a quality improvement project in east London (Sally Hull, Tahseen A Chowdhury, Rohini Mathur, John Robson) • **Decreasing readmissions**: it can be done but one size does not fit all (Finlay A McAlister)
URL	http://qualitysafety.bmj.com/onlinefirst.dtl

Online resources

[EU] Work Package 5 Tool Boxes for Implementation of Safe Clinical Practices
http://www.pasq.eu/Wiki/SCP/WorkPackage5ToolBoxes.aspx
The European Union Network for Patient Safety and Quality of Care has developed a series of tool boxes to assist "Health Care Organisations (HCOs) through the implementation process of the Safe Clinical Practices (SCPs)". The tool boxes include information on the specific SCP and additionally they offer a selection of specific tools like videos, checklists and guidelines which can be used and/or adapted. Included in this set:

- *Tool Box for WHO Surgical Safety Checklist*
- *Tool Box for Medication Reconciliation*
- *Tool Box for Multimodal intervention to increase hand hygiene compliance*
- *Tool Box for Paediatric Early Warning Scores (PEWS)*

Generic implementation tools related to Patient Safety and Quality of Care have also been collected.

[USA] Your safer-surgery survival guide
http://www.consumerreports.org/cro/magazine/2013/09/safe-surgery-survival-guide/index.htm
A US consumer magazine/site has rated 2,463 hospitals across the USA by looking at results for 27 kinds of scheduled surgeries, which are combined into an overall surgery rating, and by also developing Ratings for five of those procedures: back surgery, replacements of the hip or knee, and procedures to remove blockages in arteries in the heart (angioplasty) or neck (carotid artery surgery). The project used billing claims that hospitals submitted to (US) Medicare for patients 65 and older, from 2009 through 2011.
They accept that there are limitations with the available data but argue the case for helping patients and consumers for being better informed in their health decisions.
