AUSTRALIAN COMMISSION ON SAFETY AND QUALITY IN HEALTH CARE



On the Radar

Issue 255 11 January 2016

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On the Radar

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Contributors: Niall Johnson

Reports

Appropriate Use of Advanced Technologies for Radiation Therapy and Surgery in Oncology: Workshop Summary

National Research Council

Washington, DC: The National Academies Press; 2016. 110 p.

URL	http://iom.nationalacademies.org/Reports/2015/Appropriate-Use-of-Advanced-	
	Technologies-for-Radiation-Therapy-and-Surgery-in-Oncology.aspx	
	http://www.nap.edu/catalog/21859/appropriate-use-of-advanced-technologies-for-	
	radiation-therapy-and-surgery-in-oncology	
Notes	In July 2015 the US Institute of Medicine's National Cancer Policy Forum	
	convened a workshop on "Appropriate Use of Advanced Technologies for	
	Radiation Therapy and Surgery in Oncology". This report is a summary of that	
	workshop. At the workshop, clinicians, researchers, and patients along with	
	representatives from industry, the Food and Drug Administration, the National	
	Cancer Institute, and the Centers for Medicare & Medicaid Services discussed	
	topics related to radiation therapy and surgery for cancer, including issues around	
	cost of these novel treatments and assessment of how they affect patient outcomes.	

Journal articles

How safe is primary care? A systematic review

Panesar SS, deSilva D, Carson-Stevens A, Cresswell KM, Salvilla SA, Slight SP, et al.

BMJ Quality & Safety [epub].

Much of the safety and quality gaze alights on the acute or hospital setting, whereas the bulk of actual healthcare delivery takes place in the primary care setting. The actual scale of the safety and quality issue in primary care is something of a 'known unknown'. This paper describes a review (using 9 systematic reviews and 100 primary studies) in order to understand how frequent patient safety incidents occur in primary care and the proportion that lead to patient harm. The authors report that "Studies reported between <1 and 24 patient safety incidents per 100 consultations. The median from population-based record review studies was 2–3 incidents for every 100 consultations/records reviewed. It was estimated that around 4% of these incidents may be associated with severe harm Incidents relating to diagnosis and prescribing were most likely to result in severe harm." However, as the related editorial (http://dx.doi.org/10.1136/bmjqs-2015-005006) observes, this review included incidents of commission, not those of omission. The editorialist suggests that "It is critical thatsafety surveillance efforts in primary care include incidents involving errors of both commission and omission."	two Quarty & Surety [epus].		
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For information on the Commission's work on primary health care, see http://www.safetyandquality.gov.au/our-work/primary-health-care/

Patient safety's missing link: using clinical expertise to recognize, respond to and reduce risks at a population level

Hibbert PD, Healey F, Lamont T, Marela WM, Warner B, Runciman WB International Journal for Quality in Health Care. 2015 [epub].

DOI	http://dx.doi.org/10.1093/intqhc/mzv091
Notes	This (Australian) paper suggests that the focus of incident reporting systems needs to shift from reporting to analysis and response to the risks they reveal. The authors suggest an approach for risk surveillance, aggregation and analysis, develop and dissemination of risk reduction strategies. This approach is based on the application of clinical and human factors expertise. The approach requires "a non-hierarchical multidisciplinary team comprising clinicians and subject-matter and human factors experts to provide interpretation and high-level judgement". The risk surveillance, review and response process includes searching of large incident and other databases for how and why things have gone wrong, narrative analysis by clinical experts, consultation with the health care sector, and development and pilot testing of corrective strategies. The authors argue that the additional or "incremental cost of a population-based response function is modest compared with the 'reporting' element."

Prevention of falls in acute hospital settings: a multi-site audit and best practice implementation project

Stephenson M, McArthur A, Giles K, Lockwood C, Aromataris E, Pearson A International Journal for Quality in Health Care. 2015 [epub].

Safety Standards: Implementing Fall Prevention Interventions and Sustaining Lower Fall Rates by Promoting the Culture of Safety on an Inpatient Rehabilitation Unit

Leone RM, Adams RJ

Rehabilitation Nursing. 2015 [epub].

	ir tursing. 2015 [epub].
DOI	Stephenson et al http://dx.doi.org/10.1093/intqhc/mzv113
	Leone et al http://dx.doi.org/10.1002/rnj.250
Notes	Stephenson et al report on a survey or audit of nine Australian hospitals seeking to understand falls prevention practices, including the implementation of best practice interventions. The audit saw the compliance rate increase and be sustained across two follow-ups. However, as the authors report "Despite sustained practice improvement, reported fall rates remained unchanged. The focus on staff education possibly led to improved reporting of falls, which may explain the apparent lack of effect on fall rates." The authors suggest that clinical audit and feedback offer an effective strategy for promoting improvement in falls prevention practices. Leone et al looked at the narrower setting of the inpatient rehabilitation unit (a 61-bed unit in a 1,070-bed tertiary teaching hospital) and suggest that they found nursing leadership in promoting safety culture helped fall prevention efforts that led to decreased fall rates.

For information on the Commission's work on falls prevention, see http://www.safetyandquality.gov.au/our-work/falls-prevention/

A Drug Safety Rating System Based on Postmarketing Costs Associated with Adverse Events and Patient Outcomes

Hoffman KB, Dimbil M, Kyle RF, Tatonetti NP, Erdman CB, Demakas A, et al. Journal of Managed Care & Specialty Pharmacy. 2015;21(12):1134-43c.

DOI	http://dx.doi.org/10.18553/jmcp.2015.21.12.1134
Notes	Paper describing a drug safety rating system that attempts to "reflect drug safety in heterogeneous, real-world populations" and estimates costs associated with serious adverse events (AEs) and unfavourable patient outcomes associated with the use of 706 particular medications. The drugs with the highest individual scores in the system tended to be kinase inhibitors, thalidomide analogs, and endothelin receptor antagonists. Other classes with high scores included hepatitis C virus NS3/4A protease inhibitor, recombinant human interferon beta, vascular endothelial growth factor-directed antibody, and tumor necrosis factor blocker.

An integrative review of patient safety in studies on the care and safety of patients with communication disabilities in hospital

Hemsley B, Georgiou A, Hill S, Rollo M, Steel J, Balandin S Patient Education and Counseling [epub].

Physician and Nurse Nighttime Communication and Parents' Hospital Experience Khan A, Rogers JE, Melvin P, Furtak SL, Faboyere GM, Schuster MA, et al. Pediatrics`. 2015 November 2015;136(5).

Patient-Initiated E-mails to Providers: Associations With Out-of-Pocket Visit Costs, and Impact on Care-Seeking and Health

Reed M, Graetz I, Gordon N, Fung V

American Journal of Managed Care. 2015 December 2015;21(12):e632-e9.

A <u>merican Jo</u>	ournal of Managed Care. 2015 December 2015;21(12):e632-e9.
	Hemlsey et al http://dx.doi.org/10.1016/j.pec.2015.10.022
DOI / URL	Khan and Rogers http://pediatrics.aappublications.org/content/136/5/e1249
	Reed et al http://www.ajmc.com/journals/issue/2015/2015-vol21-n12/Patient-
	<u>Initiated-E-mails-to-Providers-Associations-With-Out-of-Pocket-Visit-Costs-and-</u>
	Impact-on-Care-Seeking-and-Health
	A number of items that all have a focus on communication and its role in the
	quality and safety of care.
	Hemlsey et al report on a literature review that looked at the patient safety of
	hospital in-patients with communications disabilities. From the 27 studies included
	they found a range of adverse event types, but report that little detail was provided
	about contributing or protective factors for safety incidents in hospital for these
	patients or the impact of the incidents on the patient or organisations involved. It is
	considered that family and carers may be a protective factor in relation to patient
	safety incidents and that hospital staff need to listen to patients and carers who raise
	concerns about care in this potentially vulnerable population.
	Khan et al. explore the issue of how clinician's communication to and with the
	parents of paediatric patients, particularly at night, impact the parents' experience
	of their child's hospitalisation. Based on almost 400 completed surveys, the
	researchers found that 42.5% reported "a top overall experience construct score"
	and that top-rated overall experience scores were associated with higher scores for
	communication and experience with nighttime doctors for communication and
Notes	experience with nighttime nurses, and for nighttime doctor–nurse interaction.
	Parents provided the highest percentage of top ratings for the individual item
	pertaining to whether nurses listened to their concerns (70.5% strongly agreed) and
	the lowest such ratings for regular communication with nighttime doctors (31.4%
	excellent).
	As the authors conclude, "Parent communication with nighttime providers and
	parents' perceptions of communication and teamwork between these providers may
	be important drivers of parent experience."
	Reed et al report on the development and use of a portal that allows patients with
	chronic conditions to communicate with their clinicians using secure, confidential
	email. Based on surveys of 1,041 patients in the (US) Kaiser Permanente health
	system – all of whom had chronic conditions – the authors report that many
	patients used e-mail to initiate conversations with their health care providers and of
	these "42% reported that it reduced their phone contacts, 36% reduced in-person
	office visits and 32% reported e-mailing improved their overall health" (67%
	reported that it did not change their overall health and less than 1 percent said that
	e-mailing made their health worse."

For information on the Commission's work on clinical communications, see http://www.safetyandquality.gov.au/our-work/clinical-communications/

Narrativizing Nursing Students' Experiences With Medical Errors During Clinicals Noland CM, Carmack HJ Qualitative Health Research. 2015 October 1, 2015;25(10):1423-34.

The stories clinicians tell: achieving high reliability and improving patient safety Cohen DL, Stewart KO

The Permanente Journal. 2016;20(1). [epub]

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DOI	Noland and Carmack http://dx.doi.org/10.1177/1049732314562892
	Cohen et al http://dx.doi.org/10.7812/TPP/15-039
	A pair of items reflecting on how stories or narratives can be effective in
	understanding and improving the culture of care. While this is not uncommonly
	used when discussing the patient perspective, the patient experience, it is not so
	common to hear the clinicians' stories used for this purpose.
N.	Noland and Carmack discuss how 68 nursing students recount their experiences
	with medical errors – and the implications of the narrative types and their possible
	impact on nursing education. They report finding three different narratives:
Notes	1. the "save the day" narrative
	2. the "silence" narrative, and
	3. the "not always right" narrative.
	Cohen and Stewart offer a number of narratives or stories that provide insights into
	(US) clinician perspective on incident recognition, disclosure and transparency, just
	culture, clinical workload pressures, human factors, clinicians as secondary victims,
	of disruptive and punitive behaviours, professional morale, and personal failings.

Back to the future: Patient experience and the link to quality, safety, and financial performance Cochrane BS, Hagins M, King JA, Picciano G, McCafferty MM, Nelson B Healthcare Management Forum. 2015;28(6 suppl):S47-S58.

DOI http://dx.doi.org/10.1177/0840470415598405 Paper describing how a number of Canadian health facilities/services have worked
with a commercial consultancy to develop and implement a model of what they term 'Evidence-Based Leadership' (EBL) to support "the alignment of all activitie and behaviours toward specific organizational goals, including measurable patient experience improvements." The article discusses case studies showing "rapid progress in patient experience indicators while simultaneously making gains in critical areas such as clinical outcomes, safety, physician and staff engagement, and financial performance."

For information on the Commission's work on patient and consumer centred care, see http://www.safetyandquality.gov.au/our-work/patient-and-consumer-centred-care/

American Journal of Medical Quality January/February, 2016; Vol. 31, No. 1

URL	http://ajm.sagepub.com/content/31/1?etoc
Notes	A new issue of the <i>American Journal of Medical Quality</i> has been published. Articles in this issue of the <i>American Journal of Medical Quality</i> include:

- Implementing Interdisciplinary Teams Does Not Necessarily Improve **Primary Care Practice Climate** (Sherry M Grace, Jeremy Rich, William Chin, and Hector P Rodriguez)
- Creating a Patient-Centered Health Care Delivery System: A Systematic Review of Health Care Quality From the Patient Perspective (Khaled Mohammed, Margaret B Nolan, Tamim Rajjo, Nilay D Shah, Larry J Prokop, Prathibha Varkey, and Mohammad H Murad)
- Design and Implementation of the **Harvard Fellowship in Patient Safety** and Quality (Tejal K Gandhi, Susan A Abookire, Allen Kachalia, Kenneth Sands, Elizabeth Mort, G Bommarito, J Gagne, L Sato, and S N Weingart)
- Creating a **Fellowship Curriculum in Patient Safety and Quality** (Susan A Abookire, Tejal K Gandhi, Allen Kachalia, Kenneth Sands, Elizabeth Mort, Grace Bommarito, Jane Gagne, Luke Sato, and Saul N Weingart)
- Surgical Multidisciplinary Rounds: An Effective Tool for Comprehensive Surgical Quality Improvement (Timothy Counihan, Monique Gary, Enrique Lopez, Sharyl Tutela, Gray Ellrodt, and Richard Glasener)
- The Educational Needs of Clinicians Regarding **Anticoagulation Therapy** for Prevention of Thromboembolism and Stroke in Patients With Atrial Fibrillation (Terry Ann Glauser, Justin Barnes, H Nevins, and W Cerenzia)
- Development of a Quality Improvement Bundle to Reduce **Tracheal Intubation–Associated Events in Pediatric ICUs** (Simon Li, Kyle J Rehder, John S Giuliano, Jr, Michael Apkon, Pradip Kamat, Vinay M Nadkarni, Natalie Napolitano, Ann E Thompson, Craig Tucker, Akira Nishisaki, and for the National Emergency Airway Registry for Children (NEAR4KIDS) Investigators and Pediatric Acute Lung Injury and Sepsis Investigator (PALISI) Network Investigators)
- Improving Outcomes in Patients With **Sepsis** (Scott B Armen, Carol V Freer, John W Showalter, Tonya Crook, Cynthia J Whitener, Cheri West, Thomas E Terndrup, Marissa Grifasi, C J DeFlitch, and C S Hollenbeak)
- The Effect of an Electronic **SBAR Communication Tool** on Documentation of Acute Events in the Pediatric Intensive Care Unit (Rahul S Panesar, Ben Albert, Catherine Messina, and Margaret Parker)
- Hospital Bed Type, the Electronic Medical Record, and Safe Bed Elevation in the Intensive Care Setting (Zachary W Fitch, Damon Duquaine, Rika Ohkuma, Eric B Schneider, and Glenn J R Whitman)
- Outcomes of a Neonatal Golden Hour Implementation Project (Terri L Ashmeade, Laura Haubner, Sherie Collins, B Miladinovic, and K Fugate)
- Delphi Method Validation of a Procedural Performance Checklist for Insertion of an Ultrasound-Guided Internal Jugular Central Line (Nicholas Hartman, Mary Wittler, Kim Askew, and David Manthey)
- Improved Knowledge, Attitudes, and Behaviors After Implementation of **TeamSTEPPS Training** in an Academic Emergency Department: A Pilot Report (David Lisbon, Dennis Allin, Carol Cleek, Lori Roop, Michael Brimacombe, Courtney Downes, and Susan K. Pingleton)
- **Health Disparities**: Will a Coalition of the Willing Make a Difference? (Robert A Beltran)
- Creating a Standardized Order Set for **DKA Admissions** to the **PICU** (Christopher Blunden and Maureen Walsh Koricke)

Journal for Healthcare Quality January/February 2016 - Volume 38 - Issue 1

amaar jir t cor	dary 2010 - Volume 38 - Issue 1
URL	http://journals.lww.com/jhqonline/toc/2016/01000
	A new issue of the Journal for Healthcare Quality has been published. Articles in
	this issue of the Journal for Healthcare Quality include:
	• Comparative Effectiveness of Risk-Stratified Care Management in
	Reducing Readmissions in Medicaid Adults With Chronic Disease
	(Hewner, Sharon; Wu, Yow-Wu Bill; Castner, Jessica)
	Patient Safety Errors: Leveraging Health Information Technology to
	Facilitate Patient Reporting (Huerta, Timothy R; Walker, Curt; Murray,
	Kelsey R; Hefner, Jennifer L; McAlearney, A S; Moffatt-Bruce, Susan)
	Cross-Site Scheduling of Endoscopic Procedures Improves Efficiency
	While Maintaining Patient Safety (Fairchild, Erin M; Lambert, Krysta L;
	Talley, Michael I; Gleason, Angela; Wengert, Heather; Bohlen, Debra;
	Elpert, Lisa; Bryant-Sendek, Dianna; Larson, M V; Majka, A J; Kane, S V)
Notes	 Validation of a Predictive Model to Identify Patients at High Risk for
	Hospital Readmission (Spiva, LeeAnna; Hand, Marti; VanBrackle, Lewis;
	McVay, Frank)
	Enabling Quality: Electronic Health Record Adoption and Meaningful
	Use Readiness in Federally Funded Health Centers (Wittie, Michael; Ngo-
	Metzger, Quyen; Lebrun-Harris, Lydie; Shi, Leiyu; Nair, Suma)
	 Attributing Responsibility: Hospitals Account for 20% of Variance in
	Acute Myocardial Infarction Patient Mortality (Devaraj, Srikant; Patel,
	Pankaj C)
	Improving Glycemic Control and Insulin Ordering Efficiency for
	Hospitalized Patients With Diabetes Through Carbohydrate Counting
	(Pearson, Kristina K; Reiland, Sarah A; Meara, John G O; Brown, Julie K;
	Fedraw, Leslie A; Mapes, David L)

BMJ Quality and Safety online first articles

URL http://qualitysafety.bmj.com/content/early/recent	
 BMJ Quality and Safety has published a number of 'online first' articles, included How safe is primary care? A systematic review (Sukhmeet Singh Pan Debra deSilva, Andrew Carson-Stevens, Kathrin M Cresswell, Sarah Angostora Salvilla, Sarah Patricia Slight, Sundas Javad, Gopalakrishna Netuveli, Itziar Larizgoitia, Liam J Donaldson, David W Bates, A Shei Editorial: Should doctors be able to exclude patients from pay-forperformance schemes? (Martin Roland) Value of small sample sizes in rapid-cycle quality improvement proj (E Etchells, M Ho, K G Shojania) A 'paperless' wall-mounted surgical safety checklist with migrated leadership can improve compliance and team engagement (Aaron Pin Cong, Daniel A Devcich, J Hannam, T Lee, A F Merry, S J Mitchell) Impact of the 2011 ACGME resident duty hour reform on hospital pa experience and processes-of-care (Ravi Rajaram, Lily Saadat, Jeanette Chung, Allison Dahlke, Anthony D Yang, David D Odell, K Y Bilimon Getting the improvement habit (Bill Lucas) Editorial: Does Tall Man lettering prevent drug name confusion error Incomplete and conflicting evidence suggest need for definitive study (Bruce L Lambert, Scott R Schroeder, William L Galanter) 	esar, n kh) ects hien ient ia)

- Comparing **NICU teamwork and safety climate** across two commonly used survey instruments (Jochen Profit, Henry C Lee, Paul J Sharek, Peggy Kan, Courtney C Nisbet, Eric J Thomas, Jason M Etchegaray, B Sexton)
- Plans to accelerate innovation in health systems are less than IDEAL (Paul M Wilson, Ruth Boaden, Gillian Harvey)
- Developing a high value care programme from the bottom up: a programme of **faculty-resident improvement projects** targeting harmful or unnecessary care (Justin M Stinnett-Donnelly, Pamela G Stevens, Virginia L Hood)
- The problem with **Plan-Do-Study-Act cycles** (Julie E Reed, Alan J Card)
- Editorial: Advancing **patient safety** through the use of **cognitive aids** (Alan F Merry, Simon J Mitchell)
- Risk-adjusted survival for adults following in-hospital cardiac arrest by day of week and time of day: observational cohort study (Emily J Robinson, Gary B Smith, Geraldine S Power, David A Harrison, Jerry Nolan, Jasmeet Soar, Ken Spearpoint, Carl Gwinnutt, Kathryn M Rowan)
- Editorial: **High-value care programmes** from the bottom-up... and the top-down (Christopher Moriates, Brian M Wong)
- Displaying radiation exposure and cost information at order entry for outpatient diagnostic imaging: a strategy to inform clinician ordering (Jenna F Kruger, Alice Hm Chen, Alex Rybkin, Kiren Leeds, David Guzman, Eric Vittinghoff, L Elizabeth Goldman)
- Why do we still page each other? Examining the frequency, types and senders of pages in academic medical services (Narath Carlile, Joseph J Rhatigan, David W Bates)
- The **Healthcare Complaints Analysis Tool**: development and reliability testing of a method for service monitoring and organisational learning (Alex Gillespie, Tom W Reader)

International Journal for Quality in Health Care online first articles

URL	http://intqhc.oxfordjournals.org/content/early/recent?papetoc
	International Journal for Quality in Health Care has published a number of 'online
	first' articles, including:
	 Associations between demographics and health-related quality of life for
	chronic non-malignant pain patients treated at a multidisciplinary pain
	centre: a cohort study (Hanne Irene Jensen, Karin Plesner, Nina Kvorning,
	Bo Lunddal Krogh, and Alan Kimper-Karl)
	• Prevention of falls in acute hospital settings : a multi-site audit and best
	practice implementation project (Matthew Stephenson, Alexa McArthur,
	Kristy Giles, Craig Lockwood, Edoardo Aromataris, and Alan Pearson)
Notes	• Incident and error reporting systems in intensive care: a systematic
	review of the literature (Anja H Brunsveld-Reinders, M Sesmu Arbous,
	Rien De Vos, and Evert De Jonge)
	A human factors approach to improving electronic performance
	measurement of venous thromboembolism prophylaxis (Molly J
	Horstman, Jennifer B Cowart, Nicole L McMaster-Baxter, Barbara W
	Trautner, and Diana E Stewart)
	• Prevalence and patterns of potentially avoidable hospitalizations in the
	US long-term care setting (Rosemary M McAndrew, David C Grabowski,
	Ankit Dangi, Gary J Young)

Online resources

[USA] Effective Health Care Program reports http://effectivehealthcare.ahrq.gov/

The US Agency for Healthcare Research and Quality (AHRQ) has an Effective Health Care (EHC) Program. The EHC has released the following final reports and updates:

- *Management of Insomnia Disorder* http://www.effectivehealthcare.ahrq.gov/search-forguides-reviews-and-reports/?pageaction=displayproduct&productID=2164
- Contrast-Induced Nephropathy: Comparative Effects of Different Contrast Media http://www.effectivehealthcare.ahrq.gov/search-for-guides-reviews-and-reports/?pageaction=displayproduct&productID=2166
- Contrast-Induced Nephropathy: Comparative Effectiveness of Preventive Measures
 http://www.effectivehealthcare.ahrq.gov/search-for-guides-reviews-and-reports/?pageaction=displayproduct&productID=2168

[UK] The digital revolution: eight technologies that will change health and care http://www.kingsfund.org.uk/publications/articles/eight-technologies-will-change-health-and-care
To mark the new year, the {UK] King's Fund published this article examining the technologies most likely to change health and care over the next few years. The technologies covered include:

- 1. The smartphone
- 2. At-home or portable diagnostics
- 3. Smart or implantable drug delivery mechanisms
- 4. Digital therapeutics
- 5. Genome sequencing
- 6. Machine learning
- 7. Blockchain
- 8. The connected community

The authors also recognise that there are challenges that may arise, including:

- how to ensure universal access to any benefits ..., ensuring the system doesn't get left behind by a consumer market and fail to provide poorer or excluded citizens with their benefits
- how to encourage uptake of new care methods and models built around them
- how to deal with the great volume of health information these technologies can generate.
- the need for evidence on costs and benefits to deliver on their promise.
- the need to remain focused on the people behind the technology and their needs the patients, citizens and communities for whom it will be put to work.

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