Journal Scan

Recent Literature of Interest

Medical Errors: Who, What, When, and Why. What the Public Wants to Know.

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OBJECTIVES: To determine how and when the public wishes to learn of health care errors and assess the degree of error the public believes should be reported to government reporting agencies, state medical boards, and hospital patient safety committees. To evaluate what role the public believes medical educators should play in this process. METHODS: A 12-item survey was administered to a convenience sample of emergency medicine patients and families during their evaluation in a level-one academic trauma center. Results were tabulated for each positive response and data reported as percentage. Data were analyzed using chi-square. RESULTS: 258 surveys were returned (80%). A majority of patients wished to be informed immediately of any medical error (76.4%) and to have full disclosure of the error's extent (88%). Patients believe mistakes that affect the health of the patient should be reported to government agencies (54%), to state medical boards (63%), and to hospital committees (50%). Half of respondents also believe that even trivial mistakes should be reported to a hospital patient safety committee. Respondents believe medical educators should teach students to: be honest and compassionate (38%), tell patients about mistakes (25%), and develop systems to detect medical mistakes (17%). No respondent felt teachers should punish students who commit an error. The frequency of hospital admission, or physician visits per year had no impact on response pattern (chi(2) = ns) CONCLUSIONS: Regardless of health care utilization, a majority of patients want full disclosure of any medical error and wish to be informed of the error immediately upon its detection. Surprisingly, only slightly more than half of patients support reporting of significant errors to government agencies (54%) or the state medical board (63%). The public believes medical educators should avoid reprisals for errors during training.
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Assessing Professional Behaviour and Medical Error

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The mission of medical schools underwent significant change in the post-Second World War period, which resulted in a de-evaluation of teaching, which in turn impacted on the type of assessment methods that emerged in the latter part of the twentieth century. Assessment based on direct observation did not receive the same degree of attention as methods such as multiple choice question and the objective structured clinical examination. During the past two decades medical educators have begun to emphasize the importance of teaching and assessing professional behaviour. It is suggested in this paper that assessment of professional behaviour can best be achieved by means of direct observation. A review of the area of assessment of clinical competence over the past 50 years reveals that it has been dominated by assessment methods that for the most part have been removed from the clinical setting in which medical students work and learn. In this paper it is proposed that there is a need to focus attention on methods of assessment which are based on the direct observation of performance that can be used in the clinical setting. Specifically, more attention needs to be directed at two areas of performance: (1) professionalism, and (2) medical error, both of which have given rise to increasing concern in the medical profession, healthcare agencies and the public at large.
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Reducing Adverse Drug Events: Lessons from a Breakthrough Series Collaborative

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BACKGROUND: In January 1996, 38 hospitals and health care organizations (for a total of 40 hospitals) in the United States came together in an Institute for Healthcare Improvement (IHI; Boston) Breakthrough Series collaborative to reduce adverse drug events-injuries related to the use or nonuse of medications. METHODS: The participants were taught the Model for Improvement, a method for rapid-cycle change and evaluation, and were then coached on how to identify their own problem areas and develop changes in practice for rapid-cycle testing. These changes could be implementation of one or more known medication error prevention practices or new practices developed. RESULTS: During a 15-month period the 40 hospitals conducted a total of 739 tests of changes. Process changes accounted for 63% of the cycles; the remainder consisted of preliminary data gathering, consensus-building, or education cycles. Eight types of changes were implemented by seven or more hospitals, with a success rate of 70%. These changes included non-punitive reporting, ensuring documentation of allergy information, standardizing medication administration times, and implementing chemotherapy protocols. DISCUSSION: Success in making significant changes was associated with strong leadership, effective processes, and appropriate choice of intervention. Successful teams were able to define, clearly state, and relentlessly pursue their aims, and then chose practical interventions and moved early into changing

a process. They did not spend months collecting data before beginning a change. Changes that were most successful were those that attempted to change processes, not people. Health care organizations committed to patient safety need not regard current performance limits as inevitable.
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Anonymous Error Reporting as an Adjunct to Traditional Incident Reporting Improves Error Detection.

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OBJECTIVES: To compare rates of error reports from traditional hospital incident (IR) and newly instituted anonymous error reporting (AER) systems for identification of medical error and quality improvement (QI) opportunities in the ED. METHODS: A prospective observational study was conducted in an urban, adult-only level 1 trauma center with EM residency from 8/21/00 to 11/28/00. A voluntary, anonymous, non-punitive error reporting system was initiated as a formal patient safety initiative. Physicians and nurses were encouraged to report events where an error occurred or there was a "near miss" regardless of actual patient harm. A multidisciplinary, peer-review patient safety committee reviewed the first 3 months of AERs and performed root-cause analysis for QI opportunities. IRs were tabulated as per routine and correlated with AERs: Major outcome variable was number of reports from both systems, compared by chi squared. RESULTS: 18,364 patients were seen during the period studied. Significantly more AER than IR reports were submitted. 79 AER (4.3/1,000 visits, 95% CI 3.4, 5.3/1,000) and 27 IR (1.5/1,000 visits, 95% CI 0.9, 2.1/1,000) were generated (chi squared = 25.6, $p < 0.001$). Most common AERs were failure to diagnose/treat (32%), communication errors (25%), system delays (24%), and medication errors (11%). Most common IRs were falls (22%), elopement (22%), system delays (15%), and medication errors (15%). Only 4 AERs and IRs overlapped; 1 failure to diagnose/treat, 2 medication errors, and 1 communication error. None of the AERs or IRs were reported through the compulsory statewide reporting system. CONCLUSIONS: AER system has a greater reporting rate as compared to traditional IR. AERs and IRs were used by staff for different issues, and are best used as adjuncts to more completely identify error patterns and QI opportunities.
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Pharmacist participation on physician rounds and adverse drug events in the intensive care unit.

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CONTEXT: Pharmacist review of medication orders in the intensive care unit (ICU) has been shown to prevent errors, and pharmacist consultation has reduced drug costs. However, whether pharmacist participation in the ICU at the time of drug prescribing reduces adverse events has not been studied. OBJECTIVE: To measure the effect of pharmacist participation on medical rounds in the ICU on the rate of preventable adverse drug events (ADEs) caused by ordering errors. DESIGN: Before-after comparison between phase 1 (baseline) and phase 2 (after intervention implemented) and phase 2 comparison with a control unit that did not receive the intervention. SETTING: A medical ICU (study unit) and a coronary care unit (control unit) in a large urban teaching hospital. PATIENTS: Seventy-five patients randomly selected from each of 3 groups: all admissions to the study unit from February 1, 1993, through July 31, 1993 (baseline) and all admissions to the study unit (postintervention) and control unit from October 1, 1994, through July 7, 1995. In addition, 50 patients were selected at random from the control unit during the baseline period. INTERVENTION: A senior pharmacist made rounds with the ICU team and remained in the ICU for consultation in the morning, and was available on call throughout the day. MAIN OUTCOME MEASURES: Preventable ADEs due to ordering (prescribing) errors and the number, type, and acceptance of interventions made by the pharmacist. Preventable ADEs were identified by review of medical records of the randomly selected patients during both preintervention and postintervention phases. Pharmacists recorded all recommendations, which were then analyzed by type and acceptance. RESULTS: The rate of preventable ordering ADEs decreased by 66% from 10.4 per 1000 patient-days (95% confidence interval [CI], 7-14) before the intervention to 3.5 (95% CI, 1-5; P<.001) after the intervention. In the control unit, the rate was essentially unchanged during the same time periods: 10.9 (95% CI, 6-16) and 12.4 (95% CI, 8-17) per 1000 patient-days. The pharmacist made 366 recommendations related to drug ordering, of which 362 (99%) were accepted by physicians. CONCLUSIONS: The presence of a pharmacist on rounds as a full member of the patient care team in a medical ICU was associated with a substantially lower rate of ADEs caused by prescribing errors. Nearly all the changes were readily accepted by physicians.
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