

Implementation of Patient Safety Projects

Curated Library

Foundations

[Leading change: why transformation efforts fail.](#)

Kotter JP. Harvard Bus Rev 1995;73(2);59-67.

Kotter, a professor at Harvard Business School, outlines the eight stages of a successful change process, as well as common mistakes and pitfalls at each of the stages. These mistakes include not establishing a great enough sense of urgency, not...

[Continuous improvement as an ideal in health care.](#)

Berwick D. New Engl J Med. 1989;320:53-56.

Two approaches to improving quality in health care are illustrated in this article. The first, called quality by inspection, is a system based on the belief that quality is best achieved by removing “bad apples.” The second, based on the theory of...

[A model for increasing patient safety in the intensive care unit: increasing the implementation rates of proven safety measures.](#)

Krimsky WS, Mroz IB, McIlwaine JK, et al. Qual Saf Health Care. 2009;18:74-80.

Evaluating the impact of quality and safety interventions is an evolving science. While some have argued for a new paradigm in the field, others have advocated for standards similar to clinical trials. This study developed a comprehensive approach...

[Organisational readiness: exploring the preconditions for success in organisation-wide patient safety improvement programmes.](#)

Burnett S, Benn J, Pinto A, et al. Qual Saf Health Care. 2010;19:313-7.

Implementation of large-scale safety improvement programs requires learning organizations—organizations with the capacity for change. The Safer Patients Initiative was implemented at four United Kingdom sites in 2004 in collaboration with the...

[The role of theory in research to develop and evaluate the implementation of patient safety practices.](#)

Foy R, Ovretveit J, Shekelle PG, et al. BMJ Qual Saf. 2011;20:453-9.

The first decade of the patient safety movement has seen notable successes, but many highly publicized practices have been less impactful than anticipated. This AHRQ-funded expert panel calls for patient safety researchers to explicitly incorporate...

[Harnessing implementation science to improve care quality and patient safety: a systematic review of targeted literature.](#)

Braithwaite J, Marks D, Taylor N. *Int J Qual Health Care*. 2014;26:321-329.

Implementation science studies methods to promote integration of research findings and evidence into health care policy and practice. This systematic review examined which aspects of new safety practice implementations led to actual improvement....

[Implementation science: a neglected opportunity to accelerate improvements in the safety and quality of surgical care.](#)

Hull L, Athanasiou T, Russ S. *Ann Surg*. 2017;265:1104-1112.

Implementation science is utilized to understand how to apply research into practice. This review explores the use of implementation science in surgical patient safety initiatives to enable the translation of research into active care. The authors...

[Improving Quality and Safety in Healthcare.](#)

Dixon-Woods M, Martin G, eds. Cambridge, UK: Cambridge University Press; 2022-2025.

Improvement activities are complex initiatives that require synergistic actions by organizations to be sustained. This evolving "Elements" series provides background, evidence, and discussion on interdisciplinary strategies known to affect quality...

Influences

[Grand rounds in methodology: key considerations for implementing machine learning solutions in quality improvement initiatives.](#)

Verma AA, Trbovich PL, Mamdani MM, et al. *BMJ Qual Saf*. 2024;33:121-131.

Artificial intelligence and machine learning present both opportunities and threats to patient safety. This article highlights machine learning applications in quality improvement and patient safety (e.g., decision support) and practice...

[Barriers to implementation of patient safety systems in healthcare institutions: leadership and policy implications.](#)

Akins RB, Cole BR. *J Patient Saf*. 2005;1(1):9-16.

In order to develop a strategic plan to address patient safety issues, this study sought a national perspective to outline targets for intervention. Using the Delphi method, a structured technique for eliciting group judgments from expert panels...

[Implementing patient safety interventions in your hospital: what to try and what to avoid.](#)

Ranji SR, Shojania KG. *Med Clin North Am*. 2008;92:275-93, vii-viii.

Patient safety improvement initiatives are often chosen in the context of an existing tension between taking an evidence-based approach versus a practical one. This commentary provides a framework for choosing various interventions with a particular...

[Implementing hospital-based communication-and-resolution programs: lessons learned in New York City.](#)

Mello MM, Senecal SK, Kuznetsov Y, et al. *Health Aff (Millwood)*. 2014;33:30-8.

This study reports on an AHRQ-funded effort to establish communication-and-resolution protocols for general surgery in five New York City hospitals. The participating hospitals improved their incident disclosure but also encountered many critical...

[Mind the gap between recommendation and implementation—principles and lessons in the aftermath of incident investigations: a semi-quantitative and qualitative study of factors leading to the successful implementation of recommendations.](#)

Wrigstad J, Bergström J, Gustafson P. *BMJ Open*. 2014;4.

The effectiveness of root cause analysis (RCA) as a safety improvement tool has been called into question, as many institutions lack a formal mechanism for implementing and following up action items specified by RCAs. This Swedish study found that...

[Understanding why quality initiatives succeed or fail: a sociotechnical systems perspective.](#)

Wiegmann DA. *Ann Surg*. 2016;263:9-11.

Improvement efforts often face challenges associated with implementation and adherence, for example, the difficulty of engaging surgeons and other clinicians in checklist interventions. This commentary describes a model that uses a sociotechnical...

[Patient Safety: Hospitals Face Challenges Implementing Evidence-Based Practices.](#)

Washington, DC: United States Government Accountability Office; February 2016. Publication GAO-16-308.

Despite support for evidence-based medicine as a strategy to improve safety and quality, reliable use of best practices is lacking. Analyzing how six hospitals tried to implement evidence-based safety practices, this report identified in-house...

[Patient safety from executive hospital management to wards: a qualitative study identifying factors influencing implementation.](#)

Conner T, Unsworth J, Machin A. *J Nurs Manag*. 2020;28:1134-1143.

Using qualitative methods, this article synthesizes feedback from interviews and focus groups with hospital leadership and healthcare workers (e.g., executives, charge nurses, staff nurses) about the implementation of safety initiatives at one UK...

[Understanding the factors influencing implementation of a new national patient safety policy in England: lessons from 'Learning from Deaths'.](#)

Lalani M, Morgan S, Basu A, et al. *J Health Serv Res Policy*. 2023;28:50-57.

Autopsies following unexpected deaths can provide valuable insights and learning opportunities for improving patient safety. In 2017, the National Health Service (NHS) implemented “Learning from Deaths” (LfD) to report, learn from, and avoid...

Process

[Key factors for effective implementation of healthcare workers support interventions after patient safety incidents in health organisations: a scoping review.](#)

Guerra-Paiva S, Lobão MJ, Simões DG, et al. *BMJ Open*. 2023;13:e078118.

Many clinicians experience emotional and/or psychological distress after involvement in an adverse event. This scoping review of 29 articles identified several factors supporting successful implementation of programs to support healthcare workers...

[Reconciling medications at admission: safe practice recommendations and implementation strategies.](#)

Rogers G, Alper E, Brunelle D, et al. *Jt Comm J Qual Patient Saf*. 2016;32:37-50.

Medication reconciliation is a targeted National Patient Safety Goal. This study describes the experiences of 50 Massachusetts hospitals that collaborated in an initiative to implement a medication reconciliation process. The authors provide a...

[Implementing a Program of Patient Safety in Small Rural Hospitals.](#)

Rockville, MD: Agency for Healthcare Research and Quality; October 2004.

This AHRQ-funded Partnerships in Implementing Patient Safety (PIPS) project report presents an implementation structure for medication safety and safety culture development in small rural hospitals.

[Improving patient safety in intensive care units in Michigan.](#)

Pronovost P, Berenholtz SM, Goeschel CA, et al. *J Crit Care*. 2008;23:207-212.

The Keystone ICU project is a landmark achievement in patient safety. This project, funded by AHRQ, represented a collaboration between patient safety experts at Johns Hopkins University and the Michigan Hospital Association to improve patient...

[Explaining Michigan: developing an ex post theory of a quality improvement program.](#)

Dixon-Woods M, Bosk CL, Aveling EL, et al. *Milbank Q*. 2011;89:167-205.

The remarkable success of the Keystone ICU project was initially publicized as an example of the power of checklists. While checklists are a useful safety tool, this study used an ethnographic approach to better understand the sociological factors...

All Library Content

[Grand rounds in methodology: key considerations for implementing machine learning solutions in quality improvement initiatives.](#)

Verma AA, Trbovich PL, Mamdani MM, et al. *BMJ Qual Saf*. 2024;33:121-131.

Artificial intelligence and machine learning present both opportunities and threats to patient safety. This article highlights machine learning applications in quality improvement and patient safety (e.g., decision support) and practice...

[Key factors for effective implementation of healthcare workers support interventions after patient safety incidents in health organisations: a scoping review.](#)

Guerra-Paiva S, Lobão MJ, Simões DG, et al. *BMJ Open*. 2023;13:e078118.

Many clinicians experience emotional and/or psychological distress after involvement in an adverse event. This scoping review of 29 articles identified several factors supporting successful implementation of programs to support healthcare workers...

[Improving Quality and Safety in Healthcare.](#)

Dixon-Woods M, Martin G, eds. Cambridge, UK: Cambridge University Press; 2022-2025.

Improvement activities are complex initiatives that require synergistic actions by organizations to be sustained. This evolving "Elements" series provides background, evidence, and discussion on interdisciplinary strategies known to affect quality...

[Understanding the factors influencing implementation of a new national patient safety policy in England: lessons from 'Learning from Deaths'.](#)

Lalani M, Morgan S, Basu A, et al. *J Health Serv Res Policy*. 2023;28:50-57.

Autopsies following unexpected deaths can provide valuable insights and learning opportunities for improving patient safety. In 2017, the National Health Service (NHS) implemented "Learning from Deaths" (LfD) to report, learn from, and avoid...

[Patient safety from executive hospital management to wards: a qualitative study identifying factors influencing implementation.](#)

Conner T, Unsworth J, Machin A. *J Nurs Manag*. 2020;28:1134-1143.

Using qualitative methods, this article synthesizes feedback from interviews and focus groups with hospital leadership and healthcare workers (e.g., executives, charge nurses, staff nurses) about the implementation of safety initiatives at one UK...

[Harnessing implementation science to improve care quality and patient safety: a systematic review of targeted literature.](#)

Braithwaite J, Marks D, Taylor N. *Int J Qual Health Care*. 2014;26:321-329.

Implementation science studies methods to promote integration of research findings and evidence into health care policy and practice. This systematic review examined which aspects of new safety practice implementations led to actual improvement....

[Implementation science: a neglected opportunity to accelerate improvements in the safety and quality of surgical care.](#)

Hull L, Athanasiou T, Russ S. *Ann Surg*. 2017;265:1104-1112.

Implementation science is utilized to understand how to apply research into practice. This review explores the use of implementation science in surgical patient safety initiatives to enable the translation of research into active care. The authors...

[Implementing a Program of Patient Safety in Small Rural Hospitals.](#)

Rockville, MD: Agency for Healthcare Research and Quality; October 2004.

This AHRQ-funded Partnerships in Implementing Patient Safety (PIPS) project report presents an implementation structure for medication safety and safety culture development in small rural hospitals.

[Understanding why quality initiatives succeed or fail: a sociotechnical systems perspective.](#)

Wiegmann DA. *Ann Surg.* 2016;263:9-11.

Improvement efforts often face challenges associated with implementation and adherence, for example, the difficulty of engaging surgeons and other clinicians in checklist interventions. This commentary describes a model that uses a sociotechnical...

[Patient Safety: Hospitals Face Challenges Implementing Evidence-Based Practices.](#)

Washington, DC: United States Government Accountability Office; February 2016. Publication GAO-16-308.

Despite support for evidence-based medicine as a strategy to improve safety and quality, reliable use of best practices is lacking. Analyzing how six hospitals tried to implement evidence-based safety practices, this report identified in-house...

[Explaining Michigan: developing an ex post theory of a quality improvement program.](#)

Dixon-Woods M, Bosk CL, Aveling EL, et al. *Milbank Q.* 2011;89:167-205.

The remarkable success of the Keystone ICU project was initially publicized as an example of the power of checklists. While checklists are a useful safety tool, this study used an ethnographic approach to better understand the sociological factors...

[Mind the gap between recommendation and implementation—principles and lessons in the aftermath of incident investigations: a semi-quantitative and qualitative study of factors leading to the successful implementation of recommendations.](#)

Wrigstad J, Bergström J, Gustafson P. *BMJ Open.* 2014;4.

The effectiveness of root cause analysis (RCA) as a safety improvement tool has been called into question, as many institutions lack a formal mechanism for implementing and following up action items specified by RCAs. This Swedish study found that...

[Implementing hospital-based communication-and-resolution programs: lessons learned in New York City.](#)

Mello MM, Senecal SK, Kuznetsov Y, et al. *Health Aff (Millwood).* 2014;33:30-8.

This study reports on an AHRQ-funded effort to establish communication-and-resolution protocols for general surgery in five New York City hospitals. The participating hospitals improved their incident disclosure but also encountered many critical...

[Improving patient safety in intensive care units in Michigan.](#)

Pronovost P, Berenholtz SM, Goeschel CA, et al. *J Crit Care.* 2008;23:207-212.

The Keystone ICU project is a landmark achievement in patient safety. This project, funded by AHRQ, represented a collaboration between patient safety experts at Johns Hopkins University and the Michigan Hospital Association to improve patient...

[Reconciling medications at admission: safe practice recommendations and implementation strategies.](#)

Rogers G, Alper E, Brunelle D, et al. *Jt Comm J Qual Patient Saf.* 2016;32:37-50.

Medication reconciliation is a targeted National Patient Safety Goal. This study describes the experiences of 50 Massachusetts hospitals that collaborated in an initiative to implement a medication reconciliation process. The authors provide a...

[The role of theory in research to develop and evaluate the implementation of patient safety practices.](#)

Foy R, Ovretveit J, Shekelle PG, et al. *BMJ Qual Saf.* 2011;20:453-9.

The first decade of the patient safety movement has seen notable successes, but many highly publicized practices have been less impactful than anticipated. This AHRQ-funded expert panel calls for patient safety researchers to explicitly incorporate...

[Organisational readiness: exploring the preconditions for success in organisation-wide patient safety improvement programmes.](#)

Burnett S, Benn J, Pinto A, et al. *Qual Saf Health Care.* 2010;19:313-7.

Implementation of large-scale safety improvement programs requires learning organizations—organizations with the capacity for change. The Safer Patients Initiative was implemented at four United Kingdom sites in 2004 in collaboration with the...

[Continuous improvement as an ideal in health care.](#)

Berwick D. *New Engl J Med.* 1989;320:53-56.

Two approaches to improving quality in health care are illustrated in this article. The first, called quality by inspection, is a system based on the belief that quality is best achieved by removing “bad apples.” The second, based on the theory of...

[Barriers to implementation of patient safety systems in healthcare institutions: leadership and policy implications.](#)

Akins RB, Cole BR. *J Patient Saf.* 2005;1(1):9-16.

In order to develop a strategic plan to address patient safety issues, this study sought a national perspective to outline targets for intervention. Using the Delphi method, a structured technique for eliciting group judgments from expert panels...

[Leading change: why transformation efforts fail.](#)

Kotter JP. *Harvard Bus Rev* 1995;73(2):59-67.

Kotter, a professor at Harvard Business School, outlines the eight stages of a successful change process, as well as common mistakes and pitfalls at each of the stages. These mistakes include not establishing a great enough sense of urgency, not...

[Implementing patient safety interventions in your hospital: what to try and what to avoid.](#)

Ranji SR, Shojania KG. *Med Clin North Am.* 2008;92:275-93, vii-viii.

Patient safety improvement initiatives are often chosen in the context of an existing tension between taking an evidence-based approach versus a practical one. This commentary provides a framework for choosing various interventions with a particular...