Monitoring Clinical Indicators: A methodology to improve quality of care and patient safety

Dr. Gulzar S. Lakhani
Senior Manager, Clinical Affairs
Aga Khan University Hospital, Karachi

Pakistan – literally means "LAND OF THE PURE"

Pakistan – A quick primer

K2 the second highest mountain in the world
5 out of 14 highest peaks in the world

Pakistan

A country of varied landscapes, high mountains, lush plains, beautiful coastline, rich history

Pakistan

Khewra Mines: Second Largest Salt Mine in the World

Pakistan

The land of oldest Civilization: Indus Valley and Mohenjo-Daro
A Bronze Age Civilization (3300–1300 BCE; mature period 2600–1900 BCE)
Pakistan

- 180 Million: 6th largest Nation of the World
- Karachi: 20 Million people

Pakistan

- 9th in the world for English as the official language
- 7th largest pool of scientists and Engineers in the World
- Moin Ali Nawazish making a World Record with 22 A's in A level Exams

Aerial View of AKU Karachi

- Provide Exemplary Care;
- Develop and test innovations and introduce new services;
- Support the teaching and research missions of the Faculty of Health Sciences;
- Contribute to the development of a system of healthcare and access for needy patients;
- Attain self-support

Pakistan

- No hospital standards exist at all
- Hospitals do NOT provide all services under one roof such as medicines, x-ray, food, etc.
- Limited trained manpower
- Difficult physical conditions – electricity, water
Aga Khan University Hospital Karachi

- All services under one roof
- Comprehensive Inpatient and Outpatient services in almost all major disciplines using a multi-disciplinary approach
- 15 inpatient units with a total capacity of 598 beds, including 55 critical care beds
- High brand equity and quality of care

Monitoring Clinical Indicators: A methodology to improve quality of care and patient safety

Objectives

- Clinical indicators process was used to measure the process, structure and outcome of the patient care.
- The prime objective to monitor clinical indicators at AKUH was to identify areas for improvement, set benchmarks and improve processes which would finally enhance quality of care and patient safety.

Define Indicator

Indicator used to measure current conditions as well as to forecast for future trends. Indicators are used extensively in technical analysis to predict changes in trends or patterns.

Or

Quality Indicators are key measures that help you to gauge whether your practice is heading in the right direction.

Purpose of Quality Evaluation

- To ensure high quality care and patient safety
- For review by leadership at glance
- To strength the public confidence
- To improve the management of health service
- Legal and accreditation requirements
- To increase efficiency

Uses of Clinical Indicators

Clinical indicators at AKUH were used to:

- Raise awareness
- Identify priorities
- Draw people/organizations together to collectively take action
- Target or redirect resources
- Fact (data) based
Clinical Indicators

- Presently thirty-five clinical indicators are being monitored in AKUH institutional dashboard which in 2009 was started with seventeen.
- Additionally, Departments have their own dashboard which will include many more clinical indicators.
- Indicator with focus to high priority area is identified.
- If a certain Indicator is achieving its target, the target is made more challenging.
- Clinical practice guidelines also monitor in indicator form.

Methodology

Data was collected concurrently by different methodology like:
- Retrospective Review (Review of medical records)
- Departmental records
- Clinical audits program
- Incident reports review
- Point prevalence

Clinical Indicators of AKUH

The measures selected related to the important clinical areas include:
- Patient assessments
- Laboratory services
- Radiology and diagnostic imaging services
- Surgical procedures
- Antibiotic and other medication use
- Medication errors and near misses
- Anesthesia and sedation use;
- Use of blood and blood products;
- Availability, content, and use of patient records;
- Infection prevention and control, surveillance, and reporting; and

Key Elements of Indicator

- Establish baseline
- Set benchmark (International / National practice or Best practices)
- Analysis (Reason)
- Make change (Action plan)
- Measure for change
- Follow up

Clinical Indicators

- Presently thirty-five clinical indicators are being monitored in AKUH institutional dashboard which in 2009 was started with seventeen.
- Additionally, Departments have their own dashboard which will include many more clinical indicators.
- Indicator with focus to high priority area is identified.
- If a certain Indicator is achieving its target, the target is made more challenging.
- Clinical practice guidelines also monitor in indicator form.
Responsibility of Department

At the Departmental Level the Head / manager are responsible for making the selection of indicators with targeted measurement for based on but not limited to the following criteria:

- High Risk Area.
- Priority Area / Function / Service / Process/ Outcome
- High Focus Function / Service

The review at the Departmental level should be in-depth with analysis of data on regular basis.

Responsibility of Leaders

An organization’s leaders are responsible for making the final selection of targeted measurement activities. For each of these areas, further details are sought:

- The process, procedure, or outcome to be measured.
- The availability of "science" or "evidence" supporting the measure.
- How measurement will be accomplished.
- How the measures fit into the organization’s overall plan for quality measurement and patient safety.
- The frequency of measurement.

Why Use Quality Indicators?

Quality Indicators are just like a dashboard to a driver or a cockpit panel to a pilot

Dashboard Of Clinical Indicators For Leaders
Clinical Practice Guidelines Monitored by Indicators

- AKUH experience and journey has been rewarding.
- Importance of Indicators
- Identification of processes
- Development and monitoring of Indicator
- Improvement in the process
- Identify new area of focus or more challenging target

Conclusion

Thank You