Meeting of the Minds: A CQI Colloquium

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Mind your Ps and Qs: Quality Improvement, Quality Assurance & Performance Improvement

Understanding the differences and

how to use the information to improve care

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So what is a "colloquium", anyway?

- An academic seminar
- An informal meeting for exchange of views

• ... it was a way to incorporate the letters **CQI** into our title

Goals for CQI:



- Create and environment of continued improvement
- Help agencies and individuals to look at the way they deliver care and services
- Identify root causes of problems in our systems
- Implement processes to mitigate errors
- ... AND innovate systems to make improvements in care delivery!

Terminology:

• QC: quality control

QA: quality assurance or assessment

QI: quality improvement

• PI: performance improvement

So what's the difference???



Quality Control (QC)



- Putting routine checks in place to ensure that your service will be safe and effective
- Routinely documented, usually a checklist.
 - A task that is generally easily shared among staff; all have a role to play in making dayto-day work safe
- Examples: defib checks, routine preventive maintenance, checking for outdates

Quality Assurance (QA)

- Determines where we are in relation to where we want to be
- Compares measured performance to a predetermined benchmark or threshold
- Examples: documentation review; procedure compliance; clinical studies (stroke CT times, STEMI D2B times, scene times, etc.)



Quality & Performance Improvement



- Using data to make changes for the better
- Setting specific goals and making changes to achieve those goals
 - They rely on measuring progress routinely
- Examples: Looking current clinical trends to develop new treatment guidelines; using QA data to determine specific areas to improve clinical outcomes

Example of using QA data to create a QI project:

- 2009 study of 570 pts w/non-traumatic chest pain
- Metrics separately:
 - VS 99%
 - 12-lead 92%
 - Lung sounds 73%
 - Document risk factors 73%
 - ASA 62%

- "Bundling" them together:
 - Overall compliance 39%
 - ASA was withheld for younger pts
- Conclusion: "The care received by the majority of pts with nontraumatic CP is incomplete, and that there is great inconsistency in the way CP pts are treated."
- Plan: Evidence-based education on outcomes through "bundling" of interventions

Colwell, et. al (2009). Measuring quality in the prehospital care of chest pain patients.

In a nutshell...

 Quality Assurance demonstrates that a set of requirements or criteria are met

 Quality Improvement refers to making things better

 Continuous Quality Improvement includes ongoing or repeated improvements in the process or system

What is required for an EMS Provider CQI plan?

- According to regulations, these elements should be addressed in your plan:
 - Personnel
 - Equipment & Supplies
 - Documentation
 - Clinical care and patient outcomes
 - Skills maintenance and competency (
 - Transportation and facilities
 - Public education and prevention
 - Risk management



Reference: Title 22, Division 9, Chapter 12, Article 2, Section 100402

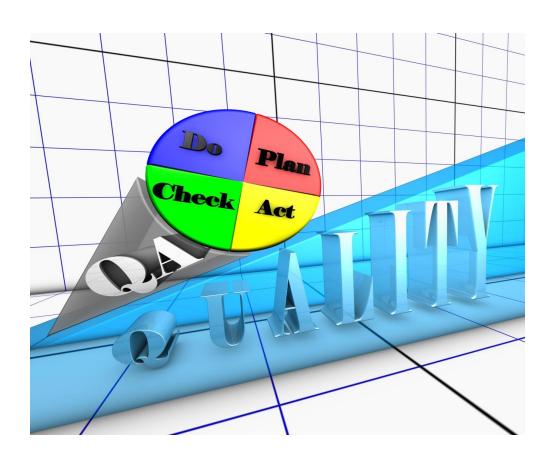
So how do we do that?

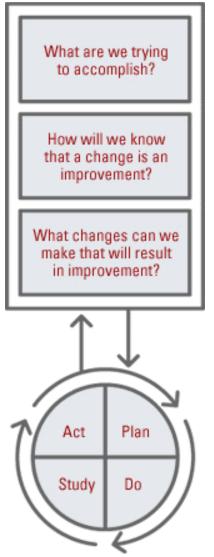
- It is OK to start with just the basics
 - Examples: EMT recerts, chart reviews, etc.



- OC EMS has two sample templates, available upon request
- Here are some suggestions to get you started...

One simple method as a basis...





Common Components of a CQI Plan

- Retrospective review → Example: PCR Audits
 - Designed to identify potential or known problems and prevent their recurrence
 - Audit for agency success as well as individual provider
- Concurrent Review → Example: Field Care Audits
 - Designed to identify problems or potential problems during patient care
- Prospective Review

 Example: Networking with peers for new ideas and trends
 - Prevent potential problems OR
 - Improve care BEFORE the call
 - Education based on new trends and treatment
 - Identifying areas for improvement based on current literature

Department Performance

Even though we are looking at the same data:

- You decide how you and your staff will measure performance
 - Do some good, old fashioned brainstorming
- You decide what processes need improvement and how to improve them
 - Create a "culture of safety" and improvement through teamwork and transparency
- You determine your direction using data and collaboration



Data Collection

- Define what you are collecting
 - So that everyone is clear
 - Describe in quantifiable terms what you will measure & how to measure it consistently
 - If there are exclusions, explain these
- Know why you are collecting the data
 - What will you do with it once you have it?
- What level of detail do you think you will need to get to the root of the issue?
- How much data will you look at?



Making Data Meaningful

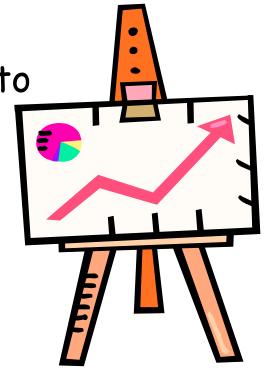
 Data, graphs, and reports can speak volumes

 They are tools to show progress over time

 They help your team stay focused to continue in the right direction

CQI isn't just one person doing audits!

 Post progress for your team members to see



Data Pitfalls - Watch out!

- Data collection and how it is done be consistent
- Inaccurate measuring, or not getting the right criteria
- Temptation to manipulate/exclude to get what you want
- Poor choice of collection period
- Lost data (Save, save, save...)



EMSA Core Measures

- Developed through grant funding to evaluate system performance
- EMSA will be collecting "sets" of data
 - Trauma Care
 - ACS Care
 - Cardiac Arrest
 - Stroke care
 - Respiratory Care
 - Pediatric EMS
 - Pain Assessment and Intervention
 - Skill Performance
 - Response and Transport
 - Public Education: CPR

You may use these to help build your plan...



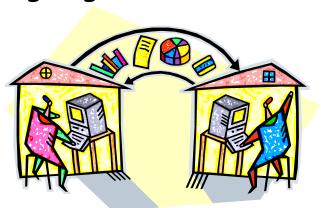
Sample Core Measures

- ACS-2: 12-lead EKG performance
 - A process measure that looks at the number of patients with a provider impression of chest pain/discomfort who have a 12-lead EKG performed
- CAR-2: Out-of-hospital arrests who have a return of spontaneous circulation (ROSC) in the field
 - A process measure collecting a % of cardiac arrest patients who have ROSC in the field

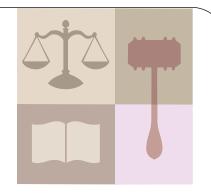
Tips for Success: Getting started

- Align your project with local or departmental education and training goals
- Start small and as you get better, expand your measures
- Network with your peers and find out what works for them or what barriers they have overcome
 - Don't re-invent the wheel!! Borrowing is good!





Tips for Success: Creating a "just culture"



- A balance between the "bad apple" and the "blame-free" concepts
- Assume that mistakes will happen
- Focus less on the "who" and more on the "how"
- Look at the system and build in safety
 - Checklists, procedures
- Understand and mitigate "complacency drift"
 - Support the reporting of "no harm, no foul" events
- Know when it is no longer a system issue and more of a "risk behavior" issue which requires counseling

Tips for Success: Sustainment



- Keep after it it benefits the patients, the agency as a whole and the individuals you work with
- Involve your staff, those who are "in the trenches"
 - They probably have great ideas
 - You might learn how things are really being done
 - They'll be more likely to support the plan and the positive changes that will come

Tips for Success: Celebrate!!

- Celebrate your success (no matter how small)
 - Reward yourself and your staff
- CQI isn't always about finding errors or figuring out who did it!
- CQI is about making a difference for the people we serve!!



"To improve is to change; to succeed is to change often."

Winston Churchill

