Overview of Healthcare Quality Improvement and Measures

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April 17, 2016

Disclosures

• Nothing to disclose
Objectives

• Review the history of the current healthcare quality improvement movement in the US
• Review the organizations that drive the healthcare reform in the US
• Learn about the impact of healthcare quality initiative on our practice

Code of Hammurabi

• This is one of the most ancient written law known to man.
• Hammurabi, the king, reigned from 1792 to 1750 BC, decided that he was chosen by the gods to deliver the law to his people. In the preface to the law code, he states, “Anu and Bel called by name me, Hammurabi, the exalted prince, who feared God, to bring about the rule of righteousness in the land.”
• This law, known as the Code of Hammurabi, a law of Ancient Near East, consisted of 282 provisions in categories such as family, labor, trade, etc.
• This is the first form of a written legal system, which has a lot of parallelism with the American justice system.
If a physician make a large incision with an operating knife and cure it, or if he open a tumor (over the eye) with an operating knife, and saves the eye, he shall receive ten shekels in money.

If a physician make a large incision with the operating knife, and kill him, or open a tumor with the operating knife, and cut out the eye, his hands shall be cut off.

An inherent assumption by patients and their families:

- All physicians provide the highest quality of care at the most reasonable cost, resulting in the best possible outcome for patients and their families.
In the last few decades:

• Patients, families, employers, purchasers and others questioned whether this assumption is indeed true in the absence of supportive data while health care costs continue to rise - $2.8 trillion in 2012.

• Organization for Economic Cooperation and Development (OECD): The United States is the highest spender on health care

Exhibit 1. Health Care Spending as a Percentage of GDP, 1980–2013
The U.S. Health System is “challenged” on many fronts....

• Compared to other industrialized countries the U.S. health care system .....  
  ▪ Has the highest inflation (> 8%/yr)  
  ▪ Does not produce the best outcomes  
  ▪ Is not rated highly by its citizens or doctors  
  ▪ Does not cover all of its citizens.... ~15% uninsured (~46 Million)
Mortality Amenable to Health Care

Deaths per 100,000 population*

* Countries' age-standardized death rates before age 75, including ischemic heart disease, diabetes, stroke, and bacterial infections.

Data: E. Nolte and C. M. McKee, London School of Hygiene and Tropical Medicine analysis of World Health Organization mortality files (Nolte and McKee 2008).


Country

- Denmark (28)
- United States (24)
- Germany (22)
- Finland (20)
- Luxembourg (18)
- Norway (15)
- U.K. (14)
- Canada (12)
- Switzerland (8)
- Italy (6)
- Sweden (4)
- France (3)
- Australia (2)
- Japan (1)

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Medicare (Largest Purchaser) Under Pressure Spending, Quality, and Outcomes:

- Medicare spending and financing*
  - 45 million elderly and disabled Americans
  - accounts for 22% of national health spending
  - total benefit payments = $426 billion
  - total annual expenses per beneficiary $14,471
  - 10% of fee-for-service beneficiaries account for 2/3 of Medicare spending
Where does all the money go?

![Bar chart showing distribution of healthcare spending]

Exhibit 5. Diagnostic Imaging Supply and Use, 2013

<table>
<thead>
<tr>
<th></th>
<th>Magnetic resonance imaging</th>
<th>Computed tomography</th>
<th>Positron emission tomography</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>MRI machines per million pop.</td>
<td>MRI exams per 1,000 pop.</td>
<td>CT scanners per million pop.</td>
</tr>
<tr>
<td>Australia</td>
<td>13.4</td>
<td>27.6</td>
<td>53.7</td>
</tr>
<tr>
<td>Canada</td>
<td>8.8</td>
<td>52.8</td>
<td>14.7</td>
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<tr>
<td>Denmark</td>
<td>–</td>
<td>60.3</td>
<td>37.8</td>
</tr>
<tr>
<td>France</td>
<td>9.4</td>
<td>90.9</td>
<td>14.5</td>
</tr>
<tr>
<td>Japan</td>
<td>46.9&lt;sup&gt;a&lt;/sup&gt;</td>
<td>–</td>
<td>101.3&lt;sup&gt;b&lt;/sup&gt;</td>
</tr>
<tr>
<td>Netherlands</td>
<td>11.5</td>
<td>50.0&lt;sup&gt;c&lt;/sup&gt;</td>
<td>11.5</td>
</tr>
<tr>
<td>New Zealand</td>
<td>11.2</td>
<td>–</td>
<td>16.6</td>
</tr>
<tr>
<td>Switzerland</td>
<td>–</td>
<td>–</td>
<td>36.6</td>
</tr>
<tr>
<td>United Kingdom</td>
<td>6.1</td>
<td>–</td>
<td>7.9</td>
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<tr>
<td>United States</td>
<td>35.5</td>
<td>106.9</td>
<td>43.5</td>
</tr>
<tr>
<td>OECD median</td>
<td>11.4</td>
<td>50.6</td>
<td>17.6</td>
</tr>
</tbody>
</table>

Exhibit 7. Prices for Hospital and Physician Services, Pharmaceuticals, and Diagnostic Imaging

<table>
<thead>
<tr>
<th></th>
<th>Total hospital and physician costs, 2013</th>
<th>Diagnostic imaging prices, 2013</th>
<th>Price comparison for in-patent pharmaceuticals, 2010 (U.S. set to 100)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Bypass surgery</td>
<td>Appendectomy</td>
<td>MRI</td>
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<tr>
<td>Australia</td>
<td>$42,130</td>
<td>$3,177</td>
<td>$350</td>
</tr>
<tr>
<td>Canada</td>
<td>–</td>
<td>–</td>
<td>–</td>
</tr>
<tr>
<td>France</td>
<td>–</td>
<td>–</td>
<td>–</td>
</tr>
<tr>
<td>Germany</td>
<td>–</td>
<td>–</td>
<td>–</td>
</tr>
<tr>
<td>Netherlands</td>
<td>$15,742</td>
<td>$4,995</td>
<td>$461</td>
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<td>New Zealand</td>
<td>$40,368</td>
<td>$6,645</td>
<td>$1,005</td>
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<tr>
<td>Switzerland</td>
<td>$36,509</td>
<td>$9,845</td>
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<tr>
<td>United Kingdom</td>
<td>–</td>
<td>–</td>
<td>–</td>
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<tr>
<td>United States</td>
<td>$75,345</td>
<td>$13,910</td>
<td>$1,145</td>
</tr>
</tbody>
</table>

Exhibit 6. Average Number of Prescription Drugs Taken Regularly, Age 18 or Older, 2013

<table>
<thead>
<tr>
<th>Country</th>
<th>Number</th>
</tr>
</thead>
<tbody>
<tr>
<td>NETH</td>
<td>1.2</td>
</tr>
<tr>
<td>SWIZ</td>
<td>1.3</td>
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<tr>
<td>UK</td>
<td>1.3</td>
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<tr>
<td>AUS</td>
<td>1.4</td>
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<tr>
<td>FR</td>
<td>1.5</td>
</tr>
<tr>
<td>NOR</td>
<td>1.5</td>
</tr>
<tr>
<td>GER</td>
<td>1.6</td>
</tr>
<tr>
<td>SWE</td>
<td>1.6</td>
</tr>
<tr>
<td>CAN</td>
<td>1.8</td>
</tr>
<tr>
<td>NZ</td>
<td>2.2</td>
</tr>
<tr>
<td>US</td>
<td>2.2</td>
</tr>
</tbody>
</table>
Pays for low quality care at the same rate as high quality care

- Current system fails to build on strength of healthcare professionals to ensure that care is appropriate, timely and safe.
- Traditional fee-for-service rewards volume and complexity of services
  - Discourage EMR, time spent to do patient education
  - Encourages seeing more patients, more often
  - Emphasis on procedures and sickness

AHRQ: Money Wasted in Healthcare

- 30% overuse, 30% treatment has no benefit
  Overall costs: 1 trillion
- Uninsured Americans 46.6 million
- US adults receive recommended care 55%
- Americans not satisfied with the quality of healthcare 54%
- Nearly 80,000 people die each year because they did not receive evidence-based care for such conditions such as hypertension, diabetes and heart disease.
- About 98,000 hospitalized patients die each year as a result of preventable medical errors.
AHRQ 1989 Report

- Wide geographic variations in practice patterns without supporting clinical evidence, and misuse, overuse of procedural treatments and underuse, overuse, and misuse of resources.
- Lack of accountability for inadequate quality rendered and for high costs incurred, lack of measurement of processes, structures, and outcomes.

Steinwachs DM, Hughes RG. Health services research: scope and significance; 2008

Obama’s first address to the Joint Session of Congress

*Health care reform cannot wait, it must not wait, and it will not wait another year.*

February 24th, 2009
Milestones in Patient Safety and Medical Quality Improvement

- Hippocrates: First, do no harm
- 200 B.C.
- CMS Physician Group Practices (PGP) Demonstration—payments earned based on financial and quality performance
- AHRQ formed by Congress
- IOM releases Crossing the Quality Chasm
- 2001
- CMS: P4P Demonstration project
- 2003
- NQF: Never events issued - 28 errors that should never occur
- 2006
- 2009
- Ernest Codman: End Result Hospital Joint Commission
- 1910
- TJC: 1st National Patient Safety Goals
- 2002
- CMS: 1st Year for Physician Quality Reporting
- 2004
- Office for Healthcare IT formed
- 2006
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- 2007
- CMS: 1st Year for Physician Quality Reporting
- 2008
- CMS: 1st Year for Physician Quality Reporting
- 2009
- PQRS-MIPS
- 2015

The American Recovery and Reinvestment Act
It contains $19 billion for advancing healthcare information technology.

Institute of Medicine (IOM) Committee on the Quality of Health Care in America
Defining What Quality Healthcare Is

- “the degree to which health services for individuals and populations increase the likelihood of desired health outcomes and are consistent with current professional knowledge.”
Institute of Medicine (IOM) Committee on the Quality of Health Care in America
Defining What Quality Healthcare is: STEEEP

  - “The current health care system frequently fails to translate knowledge into practice and to apply new technology safely and appropriately”

- Established 6 major aims for improving health care. Health care should be:
  - STEEEP: Safe, timely, effective, efficient, equitable and patient-centered

Healthcare Quality Improvement, A Century of Effort

- Ernest Codman (1869-1940)
- Track his patients via “End Result Cards” followed up on for at least one year to observe long-term outcomes.
- Established M and M at MGH
- Lost privilege because the hospital refused his suggestion of evaluating surgeon’s competency
- Creation of hospital standards and emphasized and implemented strategies to assess healthcare outcomes via ACS
1965 Medicare and Medicaid programs were established—Utilization Review Committee

- Congress established “Conditions of Participation
  - staff credentials,
  - 24-hour nursing services,
  - utilization review
- Not effectiveness because of absent association between the review process and the identification of ways to improve care.
- No formal evaluation criteria to guide providers’ decision making, and to adjust payment based on the quality of care

In 1966, “Evaluating the Quality of Medical Care” by Dr. Avedis Donabedian

- Three elements to assess quality of care: structure, process, and outcomes.
- Applied to orthopedics, the Donabedian Model suggests that care structures (ie, assigning a dedicated arthroplasty care team) and care processes (ie, designing and implementing a standard arthroplasty care pathway) can contribute to patient outcomes.
- Included clinical endpoints such as functional status, pain, complications, morbidity and mortality, as well as patient based experiences, and utilization of resources.
- This model provides a basis for the current methods used to evaluate healthcare quality.
In 1983, utilization and quality control Peer Review Organizations (PROs) were formed

- PROs were successful in achieving the intended goals of quality enhancement and cost containment; as a result they have continued to play a considerable role under the new Centers for Medicare and Medicaid Services (CMS) label of Quality Improvement Organizations (QIOs)

In 1990, National Committee for Quality Assurance (NCQA) was established

- NCQA is a non-profit organization tasked with managing accreditation programs for individual physicians, health plans, and medical groups. It measures accreditation performance through the administration and submission of the Healthcare Effectiveness Data and Information Set (HEDIS) and the Consumer Assessment of Healthcare Providers and Systems (CAHPS) survey.
1995 to 2000

• The IOM launched the comprehensive quality initiative
• The Joint Commission established the sentinel event policy
• The Quality Interagency Coordination Task Force (QuIC) was established
• The Leapfrog Group was founded
• The IOM published the transformative article “To Err is Human” followed by “Crossing the Quality Chasm”
• The National Quality Forum (NQF) was created

NQF Mission and Membership

• Mission: to improve the quality of US healthcare.
• Define national goals and priorities for healthcare quality improvement
• Build national consensus around these goals
• Endorse standardized performance metrics for quantifying and reporting. NQF endorsement has thus become the “gold standard” for healthcare performance measures, relied upon by healthcare purchasers such as CMS.
• Membership: hospitals, healthcare providers, consumer groups, purchasers, accrediting bodies, and research and healthcare quality improvement organizations. Provides comprehensive understanding of the challenges associated with quality improvement, and for the design of multidisciplinary and collaborative solutions to address them
Physician value-based modifier program (CMS)

- The Physician Value-Based Modifier Program intends to transition physician reimbursement from one that rewards volume to one that reimburses based on value.
- Provide physicians with comparative performance information that is actionable and can be used to improve the care they provide.
- 2 components: The Physician Quality and Resource Use Reports (QRURs), and the development and implementation of a Value-based Payment Modifier (VBPM).

Measure Quality Needs Quality Measures

- IOM definition of Quality Measures
  Mechanisms that enable the user to quantify the quality of a selected aspect of care by comparing it to an evidence-based criterion that specifies what is better quality
  
  Clinical performance measures are ways to assess a provider can competently and safely deliver the appropriate clinical services to the patient within the optimal time period

- 1999, The National Quality Forum (NQF) was created. NQF endorsement has thus become the “gold standard” for healthcare performance measures, relied upon by CMS.
Three categories of quality measures

• Structural metrics: measure organizational structure, material, and human resources

• Process measures: measure the care processes—such as H and P, diagnostic testing, and the justifications and indications for therapeutic interventions

• Outcome measures: mortality, co-morbidity, length of stay, readmission rates, cost-effectiveness, and patient experience.

NQF has endorsed >700 measures

• For healthcare organizations and providers of all levels, measures are being published to follow and report.

• If we elected not to participate, then we would not get paid fully by CMS.

• So, our performances on practicing these measures and reporting them are tied with our income!
HR.6111: Tax Relief and Healthcare Act of 2006 – The Basis for Value-based Care Model

- Became public law
- Stopped the scheduled 2007 cut in the Medicare Sustainable Growth rate by freezing the payment at 2005/2006 rates.
- Physician Quality Reporting Initiatives (PQRI)

1.5% bonus

Value-based Care Driving Change – National Priorities

- Patient and Family Engagement
  - Engage patients and their families in managing their health and making decisions about the care
- Population Health
  - Improve the health of the US population
- Safety
  - Improve the safety of the US Health Care System
- Palliative Care
  - Guarantee appropriate and compassionate care for patients with life-limiting illnesses
- Care Coordination
  - Ensure patients receive well-coordinated care across all providers, settings, and levels of care
- Patient-focused Care
  - Guarantee high value care across acute chronic episodes
- Overuse
  - Eliminate waste while ensuring the delivery of appropriate care
Current Programs Tie Quality Measurement To Reimbursement

- CMS Programs:
  - Physician Quality Reporting System
  - Electronic Health Record Incentive Program (and Meaningful Use)
  - Accountable Care Organizations
  - Value-based Payment Modifier

The Quality Program for the Physicians

- 2006 Physician Quality Reporting Initiative (PQRI), entitled the Physician Quality Reporting System (PQRS) as of 2011.
  - 1.5% bonus on total allowed Medicare Part B Fee-For-Service (FFS) charges for successful reporting on a minimum of 3 quality measures, or for 1 of 14 measure groups for the reporting period of July 1, 2007 through December 31, 2007
  - 2% for successful participation in both the 2009 and 2010 program years, and public reporting became mandatory.
- 2015, 1.5% penalties for failing to participate. The penalty is set to begin at a 1.5% reduction for those who fail to report on the minimum measure set and scheduled to increase to a penalty of 2% reduction in reimbursement in 2016
The Outlook:
Merit Based Incentive Payment System Begins in 2019, the Only One We All Participate

- MU likely ends this year
- Penalties in PQRS, VBPM, end in 2018
- 4 categories for risk adjusted composite performance score
  - Quality: 30%
    - Resource use: 30%
    - Meaningful use: ????
    - Clinical practice improvement activities: 15%
- All physicians can avoid penalties if they meet quality thresholds!!!
Quality Composite Score

- For 2017, the VM quality composite score will be based on PQRS quality measures that are reported through all available PQRS reporting mechanisms, as well as three additional claims-based measures.
- The benchmark for each quality measure is based on the national mean of each measure’s performance rate during the year prior to the performance year.
- So your performance is compared to the others.

Cost Composite Score

- CMS automatically calculates a group’s cost composite score based on claims data the Agency compiles during the performance year. Specifically, CMS calculates total cost of care on a per capita basis for those beneficiaries attributed to the group (i.e., CMS totals the amount paid to all providers (not just the group) for services furnished to each beneficiary attributed to the group).
- CMS adopted 5 per capita cost measures: (1) Per capita costs (i.e., total cost of care) for all attributed beneficiaries, and per capita costs for those attributed beneficiaries with (2) diabetes, (3) coronary artery disease, (4) chronic obstructive pulmonary disease, and (5) heart failure. To calculate per capita costs, CMS makes other adjustments based on the group’s beneficiary risk score.
Conclusion

• In the ever-evolving healthcare delivery environment aimed at rewarding value and quality, a focus on performance improvement and outcome measurement will be necessary for achieving success.

• As the Affordable Act begins to transform the framework of the US healthcare system, it is quickly becoming evident that the quality of care delivered will be a central and integral element of any adopted change.

• It is particularly the case that quality, as it becomes quantifiable, standardized, routinely measured, and reported, will be linked to economic rewards and penalties.

The success of our practice depends on the quality

• To be able to accurately collect data, code, bill and track patient’s care is more critical than ever for physicians

• Those can do it in a clear and consistent manner will remain profitable and relevant in the post-Affordable Care Act world

http://www.physicianspractice.com/blog/hcc-coding-10-tips-top-scores#sthash.1xIrqVIT.dpuf
Thank you!