## Health System Transformation: Current and Future

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Maintaining the Status Quo is Not an Option

- Evidence is being produced at an extremely rapid rate, but its incorporation into clinical practice is happening much more slowly.
- Transparency efforts don’t offer enough usable data for decisions regarding a specific disease and selection of a treatment option.
- We face an underperforming health care system and untenable cost forecasts.
- Too often, the patient is an afterthought.
... And There’s No Time to Waste

“Everything depends on execution; having just a vision is no solution.”

– Stephen Sondheim
Front and Center: The Role of Quality

- About AHRQ: Quality, Disparities and the Case for Change
- 21st Century Care: Care that Is Safer and Better
- Applying the Science to Patient-Centered Care
- Where to From Here?
AHRQ Priorities

Patient Safety
- Health IT
- Patient Safety Organizations
- Patient Safety Grants (incl. simulation)

Effective Health Care Program
- Comparative Effectiveness Reviews
- Patient-Centered Outcomes Research
- Clear Findings for Multiple Audiences

Ambulatory Patient Safety
- Safety & Quality Measures, Drug Management, & Patient-Centered Care
- Survey of Patient Safety Culture
- Diagnostic Error Research

Medical Expenditure Panel Surveys
- Visit-Level Information on Medical Expenditures
- Annual Quality & Disparities Reports

Other Research & Dissemination Activities
- Quality & Cost-Effectiveness, e.g., Prevention & Pharmaceutical Outcomes
- U.S. Preventive Services Task Force
- MRSA/HAI
Overall, improvement in the quality of care remains suboptimal and access to care is not improving.

Few disparities in quality are getting smaller and almost no disparities in access are getting smaller.

Quality of care varies not only across types of care but also across parts of the country.
Quality Is Improving Slowly

Quality measures that are improving, not changing or worsening, overall and for select populations

- Nearly 60 percent of health care quality measures tracked showed improvement
- However, the median rate of change was 2.5 percent per year

AHRQ 2011 National Healthcare Quality and Disparities Reports
Few Disparities in Quality of Care Are Getting Smaller

Quality measures for which disparities related to age, race, ethnicity and income are improving, not changing or worsening

- Few disparities in quality showed significant improvement.
- The number of disparities that were getting smaller exceeded the number that were getting larger.

AHRQ 2011 National Healthcare Quality and Disparities Reports
DC: Overall Quality of Care Compared with All States

Performance Meter: All Measures

= Most Recent Year
= Baseline Year

National Healthcare Quality Report, State Snapshots
<table>
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<th>Performance</th>
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<td>Women ages 50-74 who received a mammogram within the last 2 years</td>
<td>Better than average</td>
</tr>
<tr>
<td>Adults whose doctor sometimes or never listened carefully, explained</td>
<td>Average</td>
</tr>
<tr>
<td>things clearly or respected what they had to say, Medicaid,</td>
<td></td>
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<tr>
<td>Medicare</td>
<td></td>
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<tr>
<td>Surgery patients who received recommended care practices</td>
<td>Worse than average</td>
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*National Healthcare Quality Report, State Snapshots*
National Quality Strategy: Three Broad Aims

Created Under the Affordable Care Act

Better Care
Improve the overall quality, by making health care more patient-centered, reliable, accessible and safe

Healthy People/Healthy Communities
Improve the health of the U.S. population by supporting proven interventions to address behavioral, social and environmental determinants of health, in addition to delivering higher-quality care

Affordable Care
Reduce the cost of quality health care for individuals, families, employers and government

www.healthcare.gov/center/reports/quality03212011a.html
With a Focus on Six Priorities

- Making care safer by reducing harm caused in the delivery of care
- Ensuring that each person and family are engaged as partners in their care
- Promoting effective communication and coordination of care
- Promoting the most effective prevention and treatment practices for the leading causes of mortality, starting with cardiovascular disease
- Working with communities to promote wide use of best practices to enable healthy living
- Making quality care more affordable for individuals, families, employers, and governments by developing and spreading new health care delivery models
Front and Center: The Role of Quality

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- Where to From Here?
Summarize research review findings on the benefits and harms of different treatment options. Provide useful background on health conditions. Medication guides contain basic wholesale price information.
AHRQ’s Effective Health Care Program

- Clinician Guides
- Consumer Guides
- Web Site
- Mobile
- EHR Integration
- Patient Decision Aids
- CME Modules & Case Presentations
- Faculty Slides & Methods Guides
- Reports, Research & Other Initiatives
- Webcasts
- Conference Series

http://www.effectivehealthcare.ahrq.gov
Recently Released Translation Products

- ADHD in Children
- ANA and RF tests for Musculoskeletal Complaints in Children
- Chronic Pelvic Pain
- Mechanical Thrombectomy
- Pain Management in Hip Fracture
- Preventing Fractures in Low Bone Density
- Urinary Incontinence in Women
AHRQ’S Authority

Section 1013; Medicare Prescription Drug, Improvement, and Modernization Act

Three parts
1) Transparent, collaborative process for setting priorities
2) Conduct and support research
3) Assure that findings are accessible and understandable by multiple audiences

Prohibits CMS from using findings to deny care
Prioritizing Future Research Needs

Identifying Research Needs for Improving Health Care *

- Article describes challenges and lessons learned in developing a systematic approach to identifying and prioritizing future research needs (FRN)
- Based on the approach initiated by EPCs in 2010 to better define patient-centered research needs from selected systematic reviews
- Focuses on stakeholder involvement as an essential tenet in the process

The Patient-Centered Outcomes Research Trust Fund and AHRQ

- Provides funding for AHRQ to disseminate research findings of the Institute and other government-funded research, train and build capacity for research
  - Up to 20% of Patient-Centered Outcomes Research Trust Fund can be used to support research capacity building and dissemination activities

www.pcori.org
Series of reports summarizing the evidence on quality improvement strategies for chronic conditions and other priorities:

- Bundled Payment
- Health Disparities
- Patient-Centered Medical Home
- Public Reporting
- Medication Adherence

http://www.ahrq.gov/clinic/tp/gapbundtp.htm
Enabling Evidence-Based Medicine through Health IT

Streamlining Information and Clinical Processes

- Faster and broader dissemination of new evidence
- Inclusion of new evidence and treatments into electronic quality reporting systems, EHRs, etc.
- Registries
Potential Impact of Health IT on Health Care Quality

Enhances Capabilities for Uniform, Integrated Information Exchange

- Gives clinicians real-time access to complete patient data and information support to make the best decisions
- Helps patients become more involved in their own care
- Makes it possible for third-party innovators to compete in creating widely applicable services and tools
Implementing Interactive Preventive Health Records (IPHRs)

- Practical steps for integrating IPHRs into electronic health records (EHRs)
- Can be used in multiple EHRs and health care settings for integration into primary care workflow
- Based on three AHRQ-funded studies conducted Sept. 2007 – March 2012 involving 14 primary care practices

www.ahrq.gov.qual/enggingptfam.htm
MRSA prevention program* at six Indianapolis hospitals participating in a statewide Health Information Exchange

Uses Patient Administration (ADT) messages at the time of admission to identify prior evidence of MRSA

Identified patients isolated immediately

RESULT: MRSA infections in Indianapolis have dropped by two-thirds

*Indianapolis Coalition for Patient Safety
Multidisciplinary Science: EDM Forum Research Networks

11 Projects Using Electronic Health Research for CER/PCOR and QI

- Networks include between 12,000 and 7.5 million patients
- Potential reach of networks: Up to 50 million patients
- 38 CER studies
- Address all AHRQ priority populations and almost all AHRQ priority conditions

www.edm-forum.org
14 commissioned and invited papers

Informed by ongoing ARRA-funded work

Three domains:
- Analytic Methods
- Clinical Informatics
- Governance

www.edm-forum.org
Web ‘Videonovela’ Helps Patients Compare Diabetes Treatments

- Spanish-language videonovela ‘Aprende a vivir’ (Learn to Live)
- Three episodes of family drama portray challenges of managing diabetes
- Nearly 12 percent of Hispanic adults age 20 and older have diabetes; Hispanics are twice as likely as whites to be hospitalized for diabetes complications

www.healthcare411.ahrq.gov/aprendeavivir.aspx
AHRQ’s Role in Public Reporting

AHRQ Does NOT Do Provider-Level Reporting, But…

- Develops measures
  - Consumer Assessment of Healthcare Providers & Systems (CAHPS)
  - Quality Indicators
  - Common Formats for patient safety events

- Provides technical assistance and learning networks for public report producers
  - Examples: 24 Chartered Value Exchanges (CVEs)
    - Represent more than 124 million individuals
    - Public reporting is a major activity
Advancing the Science of Public Reporting

- AHRQ/CMS initiative to grow the evidence base behind the content, design, dissemination and underlying data and methodology of public reports of health care quality for consumers
  - 17 exploratory and developmental research grants to compare the quality and costs of hospitals, nursing homes, primary care, surgery, home health and hospice
  - Priority populations are also included
New Public Portal on Integration of Behavioral Health & Primary Care

The Academy
Integrating Behavioral Health and Primary Care

Experts Call for Integrating Behavioral Health and Primary Care
The 2011 Mental Health Forum and Town Hall featured integration experts. At AHRQ’s Annual Conference, panelists discussed the importance of integrating behavioral healthcare and primary care.

New & Notable
- Tue, 06/19/12 Benjamin Miller, Psy.D., Principal...
- Tue, 06/19/12 AHRQ’s release of the latest National...
- Tue, 12/06/11 Lexicon Development in Collaborative...
- Tue, 11/15/11 Additional Tasks for the Academy...
- Tue, 11/15/11 Effective Quality Improvement and...
- Wed, 06/01/11 Health Care Quality Gaps and Disparities

New & Notable items include highlights of current activities of The Academy for Integrating Behavioral Health and Primary Care, as well as new research findings, Federal initiatives and other public and private activities going on in the field of integration. Check New & Notable often for highlights from the Academy.

Integrating Behavioral Health and Primary Care
AHRQ’s vision is that the Academy for Integrating Behavioral Health and Primary Care will function as both a coordinating center and a national resource for people committed to delivering comprehensive, integrated healthcare.

The Academy Web Portal - A Resource Hub
Welcome to this new AHRQ Web portal where you will find the resources you need to advance the integration of primary care and behavioral health care and foster a collaborative environment for dialogue and discussion among relevant thought leaders.

This resource center will facilitate the work of the Academy by being a central hub for information, coordination, dissemination, and networking. The portal is structured around seven topics: Research, Education, Policy, Financing & Sustainability, Clinical & Community, Health Information Technology, Resources, and Collaboration.

Information related to integration will include evidence-based practices, descriptions of promising practices, and articles on methods used to acquire evidence. The portal will be enhanced by adding coordination, dissemination, and networking functions including Webinars and forums.

integrationacademy.ahrq.gov
MONAHRQ – New Version 3.0

- Additional indicators and health topics
  - 4 additional AHRQ QIs, including composite measures
  - 12 additional Hospital Compare measures
  - New health topic on nursing sensitive care

- New customization options

- Updated coding changes and new technical design features
  - HCUP cost-to-charge ratios convert charges to costs
Simulation
(a rapidly growing training technology)

- Learn skills in simulated setting first
- Risk free environment for learning
- Integration of multiple skills
- Immediate and realistic feedback; actions have consequences
- Readily available
Front and Center: The Role of Quality

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AHRQ-funded toolkit, “Medications at Transition and Clinical Handoffs (MATCH)” and QIO Learning Network

- Identified need for single medication history list
- Hospitals redesigned their medication history lists based on toolkit’s “One Source of Truth”
- Medication reconciliation compliance improved in participating hospitals

(KT-CQuIPS-89-94)
AHRQ’s Health Literacy
Universal Precautions Toolkit
and “Questions Are The Answer” public education campaign

- Used to educate physicians about relationship between health literacy and outcomes
- Provider Web site features AHRQ’s toolkit and a training module
- Downloadable tools for patients include “Questions Are The Answer” campaign resources
Answering Key Questions: Patient-Centered Medical Home

- PCMH is being studied rigorously; answers from ongoing research will address:
  - Which models are most effective, in what type of setting, for which types of patients?
  - Which community linkages are essential?
  - How much support do patients need to effectively self-manage?
  - How can health IT best leverage the PCMH model?
  - Will gaps in care coordination close?

http://pcmh.ahrq.gov
Patient Safety Organizations (PSOs)

- 78 current PSOs in the United States and Washington, DC
  - PSOs working with over 2000 U.S. providers, including over 1,600 hospitals
  - New PSOs include a component of the American College of Physicians

- Common Formats (CF) Update:
  - Beta version of Readmissions CF to be published Summer 2012
  - Coordinating Readmissions CF pilot test in the Veterans Administration hospital system in July 2012

- The Office of the National Coordinator sponsoring “Purple Button Challenge Award”
  - Calls for development of an application to enhance patient safety event reporting using Common Formats
Uniformed Services University of Health Sciences (USUHS)

- Pilot graduate-level course titled “Patient Safety & Quality in an IT-driven World”
- Novel partnership for USUHS and AHRQ
- Content explored theoretical underpinnings and applications of patient safety and health IT legislation and initiatives
Talking With Your Patients About Screening for Prostate Cancer

New Materials for Clinicians

After conducting a comprehensive review of the medical evidence, including the results of recent large trials, on May 22, 2012, the U.S. Preventive Services Task Force issued a final Recommendation Statement on PSA screening. This fact sheet will help you discuss PSA screening for prostate cancer.

The Task Force Recommendation on PSA-based Screening for Prostate Cancer

The U.S. Preventive Services Task Force recommends against prostate-specific antigen (PSA)-based screening for prostate cancer. The potential benefit does not outweigh the expected harms.

Population
This recommendation applies to men of all ages. It does not include the use of the PSA test for monitoring in men who have diagnosed with or who are being treated for prostate cancer.

Possible benefit of screening
In an unscreened population, about 5 out of every 1,000 men will die from prostate cancer after 10 years.

Results of several large trials have shown that, at best, PSA screening may help 1 man in 1,000 avoid death from prostate cancer after at least 10 years. Most likely, the number helped is even smaller. This means that with PSA screening, 4-5 out of every 1,000 men will die from prostate cancer after 10 years.

Expected harms of screening
• False-positive results. About 100-120 of every 1,000 men screened receive a false-positive test. Most positive tests result in biopsy, and this can cause worry and anxiety. Up to one-third of men undergoing biopsy will experience fever, infection, bladder urinary problems, and pain that they consider a moderate or major problem. One percent will be hospitalized for these complications.

• Overdiagnosis. In most cases, prostate cancer does not grow or cause symptoms. If it does grow, it usually grows so slowly it is not likely to cause health problems during a man’s lifetime. Currently, it is not possible to reliably distinguish indolent aggressive cancers. Many cancers diagnosed would have remained asymptomatic for life and do not require treatment.

• Overtreatment. Because of the uncertainty about which cancers need to be treated, 90 percent of men with prostate cancer by PSA chosen to receive treatment. Many of these men cannot benefit from treatment because their cancer will not grow health problems. Harms of treatment include:
  • Erectile dysfunction from surgery, radiation therapy, or hormone therapy (29 men affected per 1,000 men screened).
  • Urinary incontinence from radiation therapy or surgery (18 men affected per 1,000 men screened).
  • A small risk of death and serious complications from surgery:
    • 2 serious cardiovascular events per 1,000 men screened.
    • 1 case of pulmonary embolism or deep venous thrombosis per 1,000 men screened.
    • 1 perioperative death per every 3,000 men screened.

Responding to Questions From Your Patients About PSA Testing
The Task Force believes that physicians should not feel obligated to offer PSA testing if a patient does not raise the issue or request the test.

If your patient does raise the issue of PSA screening, or if you believe his individual circumstances warrant consideration of PSA screening, be sure to discuss it with him thoroughly, so he can make an informed decision. The USPSTF strongly recommends that you do not order a PSA test without such a discussion. The decision to start or continue PSA screening should reflect your patient’s understanding of the possible benefits and expected harms and should respect his preferences.

Points to Discuss With Your Patients Who Have Questions

Explain the facts about prostate cancer and what is involved in PSA testing. (Use the previous page or the information sources below.) Describe the benefits and harms not only of PSA screening itself, but of potential subsequent diagnostic testing and treatment.

Once you have explained the facts, make sure your patient’s decision about PSA testing fits with his preferences and values. One way to do this is to describe several men and ask which one your patient identifies with most. Tailor your discussion to meet those needs, preferences, and values.

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<th>Patient Scenarios</th>
<th>Discussion Points</th>
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<td>Man #1</td>
<td>This man has no strong feelings about PSA testing one way or another, but he or she has asked you to learn more about screening and consider PSA testing.</td>
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<tr>
<td>Man #2</td>
<td>This man is at increased risk of developing and dying from prostate cancer because he has one or more first-degree relatives who were diagnosed with prostate cancer before age 75, or because he is African-American.</td>
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<td>Man #3</td>
<td>This man is concerned about prostate cancer and feels that having the test will provide important information. He puts a higher priority on possibly avoiding death from prostate cancer, no matter how low the probability, than on avoiding the more risky harms associated with positive screening results and follow-up treatment.</td>
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The Bottom Line
We need better ways to screen for and treat prostate cancer. Until we make these discoveries, and even once we do, men and their families will turn to trusted health care professionals to help them make informed health care decisions. The USPSTF encourages all clinicians to have open conversations with their patients who have questions about prostate cancer and PSA testing.

Additional Information for Health Care Professionals

- Screening for Prostate Cancer: U.S. Preventive Services Task Force Recommendation Statement (USPSTF)
- Evidence Report: Screening for Prostate Cancer (USPSTF)
- Prostate Cancer Screening (Prostate) Health Professional Version (National Cancer Institute)

Additional Information for Patients

- Consumer Guide: USPSTF Recommendation on Screening for Prostate Cancer (USPSTF)
- PSA Screening: Statistics at a Glance (USPSTF), a simplified summary table of the benefits and harms
- Prostate Cancer Screening (Prostate) Patient Version (National Cancer Institute)
- Prostate Cancer (National Cancer Institute)
Guides independent pharmacies through the process of adopting e-prescribing

Illustrates how to assess pharmacy workflows to determine whether changes or updates are needed to a pharmacy software system

Discusses hurdles and problems that can arise when implementing e-prescribing

healthit.ahrq.gov/eprescribingtoolsets
A Toolset for E-Prescribing Implementation in Physician Offices

- Designed for small, independent offices to large medical groups
- Supports implementation of e-prescribing, whether as a stand-alone system or as a component of a full HER
- Useful for providers who have not achieved the full potential of their current e-prescribing system

healthit.ahrq.gov/eprescribingtoolsets
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A Decent Meal, Or a New Model of Care?

The challenge:
- Serving millions of people
- Delivering a range of services
- Keeping costs reasonable
- Attaining a consistently high level of quality

Can care be mechanized? Should it be?

Are there models we can use?

Gawande A. Big Med: Restaurant chains have managed to combine quality control, cost control, and innovation. Can health care? New Yorker. August 13, 2012
What Needs to Change?

- The way and with whom we do our work and report results (e.g., partners may get most value from initial aspects of study, don’t want to be constrained by journal timelines)
- Incorporating quality improvement, innovation, communication, etc.
- Academic Incentives and Training Programs
What Should the New Model Look Like?

That remains to be determined, although overall things to consider include:

- Stakeholders are engaged more and more when the strategic decisions are being made
- Making evidence available earlier and during different intervals of a project
- Thinking of publication as one step in the continuing process to get results into the hands of those who need it rather than the end of the research cycle
- Testing multiple conclusions in the field rather than waiting until there is a ‘right’ answer
Example of building improvement into the research

- Partnership with grants from AHRQ and various commitments from Blue Cross Blue Shield of Michigan, the Michigan Hospital Association, Johns Hopkins University and others
- Stakeholders, end users and others are able to use the data to monitor progress
- Innovative methods of dissemination and communication
- An ongoing effort to learn and improve
CUSP Cuts CLABSIs by 40 Percent in 1,100 Hospital Units

- Nationwide patient safety project
  - Developed at Johns Hopkins, tested in Michigan
  - Implemented in more than 1,100 hospital units

- Results:
  - CLABSIs reduced from 1.903 infections per 1,000 central line days to 1.137 per 1,000 days
  - Savings: more than 500 lives, $34 million in costs

- New toolkit for implementation

AHRQ Patient Safety Project Reduces Bloodstream Infections by 40 Percent.
Expanding/Enhancing the Evidence-Base

AHRQ Patient-Centered Outcomes Research Grants

- Infrastructure Development Program (R24)
  - Responds to need for information about which clinical and system design interventions are most effective for patients under specific circumstances

- Mentored Career Enhancement Award (K18)
  - Seeks investigators interested in developing new skills in patient-centered outcomes research methodology and applying those methods to the research

www.ahrq.gov/fund/grantix.htm
Key Considerations

- Interest in assessing clinician performance will continue
- Much of the measurement enterprise is “evolving”
- Collective interest in using quality measures that reflect the profession’s knowledge and authority
- “Some day” health IT will make data collection, reporting and updating of measures easy – but not today!
Where to From Here?

- Do more to ensure that new treatments and research knowledge reach patients and are implemented correctly
- Improve quality by improving access
- Expand the boundaries of basic science to include other “basic sciences” (e.g., epidemiology, psychology, communication, social marketing and economics)
- More focus on research and delivery of existing treatments

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Questions?

AHRQ Mission

To improve the quality, safety, efficiency, and effectiveness of health care for all Americans

AHRQ Vision

As a result of AHRQ's efforts, American health care will provide services of the highest quality, with the best possible outcomes, at the lowest cost

www.ahrq.gov