NC HIE Council Finance & Administration Committee

NCHICA
Research Triangle Park, NC
July 23, 2008

AGENDA

Start	Topic	Discussion Leader
2:00	Welcome and Introductions	Andrew Weniger
2:10	Approve notes from June 18th meeting	Andrew Weniger
2:15	NHIN 2 Project Business Plan • Timeline & Deliverables • Preliminary Scope Confirm Scope • Initiatives / Functionality • Business Case Discussion	Andrew Weniger Richard Steen, Bridgette Fleming, Nadine Oosmanally
3:30	Discussion of Iterations of Business Planning • Medical trading Areas Analysis • Coordination with Other Committees	Andrew Weniger
4:00	Adjourn	

Business Case for Nationwide HIE Investment

Level of Exchange	Primary Interest	Support for NHIE
Federal / National	Clinical & Administrative Referrals, Results, Pop. Health events (Medicare, MHS/VA/IHS/SSA etc.)	Strong interest in NHIE and Mandatory Use of National Standards
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Medical Trading Area / Community	Referrals, Results Delivery, Administrative (eRx, Lab, HIPAA claims/pmts)	Interest in Standards Avoid technical isolation; Mild interest in Intrastate / NHIE
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In SCOPE for Iteration 1

(Start June 2008 thru October 2008)

NHIN Business Planning Deliverable

Scenario Driven Business Case for HIE

Level of Exchange	Functionality / Transaction Based	Federal - SSA Disability Claims, Wounded Warrior	Medical Home Movement
Federal / National			
Regional / Interstate			
Statewide / Intrastate			
Cross-Communities / HIEs			
Medical Trading Area / Community			
Enterprise			

NC HIE Sustainability Plan – A 3 to 4 year Deployment Schedule that Reaches Full Maturity by 2014 (7 yrs)

Illustration of Potential Initiatives by Type

CORE
1. Summary Patient Record Exchange
2. Test Result Reporting

EXTEND VALUE
3. Medication Management
4. Consumer to Provider Communication (PHR)
5. Provider to Provider Communication (Secure Email, Referral Workflow)
6. Federal Agency Program Automation (SSA)
7. Administrative Health Plan Data Exchange (Eligibility, Referrals, Claims)

TRANS-FORM
8. Patient-centered Medical Home (Chronic Care Management)
9. Population Health Initiative Automation
10. Health Analytics (Quality & Research)

1. Summary Patient Record Exchange: Stages & Stakeholders

Step 1: Emergency Care Summaries
Step 2: Inpatient Discharge Summaries
Step 3: Outpatient Summaries and Consult Reports

Beneficiaries
- Patients
- Hospitals and physicians
- Public and private payers

Cost-bearers
- Hospitals and physicians

Possible Funders
- Hospitals and large physician practices
- Public and private payers

Summary Patient Record Exchange: Benefits & Discussion

- **Benefits**
  - More complete data = better outcomes
    - Missing data adversely affects patients 44% of the time and delays care 59% of the time[1]
  - Better discharge data = less costly treatment long-term
    - 13% of all discharges require re-hospitalization, mostly due to inadequate follow-up[2]
    - Availability of discharge summary more than doubles likelihood that PCPs will complete recommended care[3]
  - Tracking repeat ED visitors and utilization patterns
    - 12.6% of the U.S. South population visited the ED 10+ times in 2006[4]
  - Reduced administrative burden and costs
- **Discussion Points**
  - Competing studies on cost savings

Sources: [1]Smith PC, Raya-Guerra R, et al. JAMA 2005. [2, 3]AHRQ. Research Activities. Dec 2007. [4]National Center for Health Statistics.

2. Test Results Reporting

- Step 1: Results Delivery or Notification
- Step 2: Radiology Reports Delivery / Notification

Beneficiaries:
- Patients
- Hospitals and physicians
- Public and private payers
- Employers

Possible Funding Sources:
- Hospitals
- State and federal gov't
- Public and private payers

Cost Bearers:
- Public and private payers
- Laboratories

Test Results Reporting – Benefits & Discussion

Benefits:

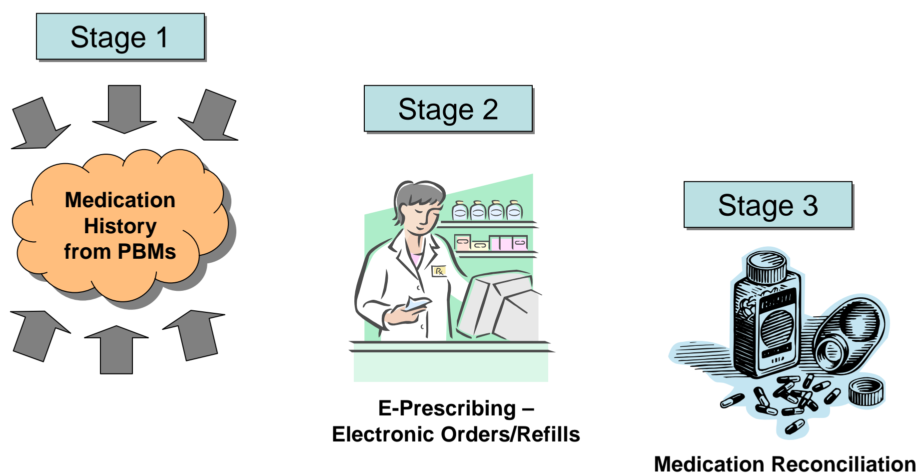
- Timelier decision-making
- Patient outcomes
- Patient satisfaction
- Fewer redundant tests
  - In 1996, laboratory costs accounted for approximately 10% of overall health care expenditures[1]
  - Doctors cancel tests 69% of the time if notified of redundancy[2]
- Employee productivity

Discussion Points:

- Less data available on diagnostic testing than labs

Source: [1]H Benge, G S Bodor, et al. Arch Pathol Lab Med. 1997.
[2]Bates DW, et al. Am J Med. 1999.

3. Medication Management Stages



Medication Management Stakeholders

- **Beneficiaries**
  - Patients
  - Physicians, Hospitals, Outpatient Diagnostics
  - Pharmacists
  - Payers
  - Employers
- **Cost-bearers**
  - Physicians and Hospitals
  - Pharmacies
  - Outpatient Diagnostics
- **Possible funders**
  - Hospitals and large physician practices
  - Public and Private Payers
  - Employers

Why North Carolina?[1]

- $6.6 billion spent on pharmaceuticals
- 13 prescriptions filled annually in NC, per capita
- 30 prescriptions filled annually for those ages 65+

Source: [1]Kaiser State Health Facts

Medication Management: Benefits & Discussion

- **Benefits**
  - Medical Errors avoidance
    - Cost of drug-related medical problems = $177.4 billion in 2000[1]
  - Liability avoidance
  - Reduction of workload
    - 30% of prescriptions received by pharmacists require call-backs to physician offices[2]
  - Better health outcomes
    - Pilot med. management project results in reduction of missed workdays by employees with asthma: from 10.8 days to 2.6 days per year[3]
- **Discussion Points**
  - Impact of existing e-Prescribing initiatives
  - Readiness for stage 3 is dependent upon high adoption rates & interoperability between in and outpatient settings

Sources: [1]Ernst FR, Grizzle AJ. J Am Pharm Assoc. 2001 Mar-Apr. [2]PBM News. Winter 2001. [3]Bunting BA, Cranor CW. J Am Pharm Assoc. 2006 Mar-Apr; 46(2).

5. Provider to Provider Communication: Stages & Stakeholders

Electronic communication between providers of care supporting a request for, and fulfillment of, a consultation.

Step 1: Secure Email Messaging

Step 2: Referral & Transfer of Care Flow

Beneficiaries

- Patients
- Hospitals and physicians
- Public and private payers
- Employers

Cost-bearers

- Large primary and specialty physician practices
- Hospitals

Possible funders

- Public and private payers
- State and federal gov't
- Employers
- Hospitals and physicians

Provider to Provider Communication: Benefits & Discussion

- **Benefits**
  - Electronic exchange of standardized & supporting clinical documentation
  - Appointment notification back to requesting provider
  - Timely return of consult report to requesting provider
  - Patient and clinician satisfaction
- **Discussion Points**
  - Portal project module
  - Privacy and security concerns
  - Impact of workflow realignment
  - Need for referral stats to extrapolate cost/benefit data

8. Patient-Centered Medical Home: Stages & Stakeholders

An approach to providing comprehensive primary care to consumers that will broaden access to primary care and prevention while enhancing care coordination.

Step 1: Organize PCMH Coalition and Sponsorship
Step 2: Initiate PCMH Pilot Sites
Step 3: Integrate PCMH Processes with HIE Infrastructure
Step 4: Align Reimbursement with PCMH Outcomes

Beneficiaries

- Patients
- Hospitals and physicians
- Care coordinators
- Public and private payers
- Employers
- Nation

Possible Funders

- State and federal gov't
- Public and private payers

Cost-bearers

- Physicians *

* Dependent upon funded programs to offset cost and provide incentives for participation

Patient-Centered Medical Home: Benefits & Discussion

Benefits – Improved

- Patient Outcomes
- Patient Satisfaction
- Chronic Disease Management
- Patient Centered Focus
- Patient Compliance
- Employee Productivity
- Patient Ownership

Benefits – Decreased

- Costs
- ER Visits PMPY
- Redundant Tests
- Unnecessary treatment
- Hospital stays PMPY
- Hospital readmits PMPY
- Catastrophic Events

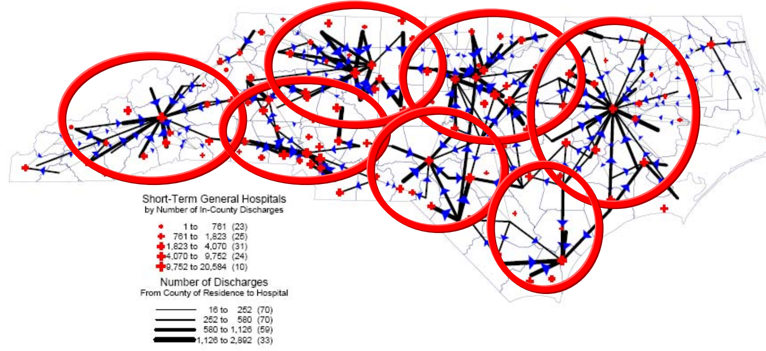
Discussion Points

- Establishing coalitions and sponsorship for PCMH
- Resistance to workflow realignment
- Costs of automation (EMR, portal, disease registry, clinical messaging, referral workflow, etc.)
- Dependency on regulatory reform for properly incented program adoption

Patient Origin for North Carolina Residents and Hospitals

Inpatient Discharges by County of Residence and Hospital

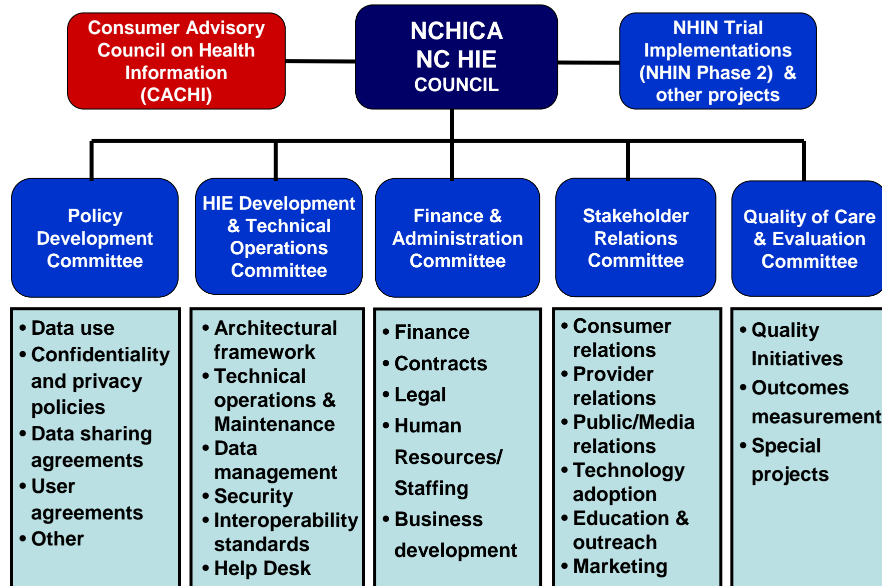
Residents Discharged from North Carolina Hospitals: October 1, 2005 to September 30, 2006



Note: For any county vectors are only drawn for hospitals receiving at least five percent of the county's Discharges.
Discharges from Psychiatric, Rehabilitation, Long Term Care, and Substance Abuse Treatment Facilities are not included.
Normal newborn discharges (DRG 391) excluded.

Source: Thomson Healthcare North Carolina Hospital Discharge Data, Fiscal Year 2006.

Produced By: Cecil G. Sheps Center for Health Services Research, University of North Carolina at Chapel Hill.



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Iteration 2 (Start ~Nov. 2008)

- Potential Business Planning Scope

Sources

- Smith PC, Raya-Guerra R, Bublitz C, Parnes B, Dickinson LM, Van VR, et al. “Missing clinical information during primary care visits.” *JAMA* 2005; 293.
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Improving health and care in North Carolina by accelerating the adoption of information technology and enabling policies

Thank You