

The Role of Electronic Health Records in Public Health

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Objectives

1. Review the evolution of Electronic Health Record tools
2. Explore how integrated data exchange can improve care locally and across the State

Evolution



Evolution



Runny nose N Y (clear / yellow / bloody) (clear / white / colored / bloody)
 Ear pain N Y (Rt / Lt / both) (keeps awake) N Y
 Swollen glands N Y Eye discharge N Y
 Sore throat N Y Short of breath N Y
 Dizziness N Y Body aches N Y
 Sinus pain N Y (Frontal / Maxillary / Occipital / Temporal: Rt / Lt)

Other sx's: med r/f ventilyn, o'tricyc ten low

Δ in asthma baseline - using Ab 3 times/week
AM tightness & workouts / Needs PE Asthma cream. Sx

O: BP: 100/72 Pulse 60 Ht: 64 #in. Wt: 122 #lbs Resp: 12 Temp: 97.2°F

Pulse Ox: 100 Peak Flow: _____
 Acute distress N Y Toxic appearance N Y
 Dehydrated N Y Meningeal sx's N Y
 TM abnormal N Y Rt / Lt / Both: erythema / retracted / fluid / discharge
 Conjunctivitis N Y Discharge: N / Y (colored / clear)
 Sinus tenderness N Y (Frontal / Maxillary / Occipital / Temporal)
 Nasal mucosal abn N Y (Rt / Lt / Both: red / swollen / pus / blood / perforation) boggy pale mucosa
 Adenopathy N Y (Rt / Lt / Bilat: cervical / supraclav / axillary: 1+ 2+ 3+ 4+)
 Pharynx abnorm N Y (Red / exudates / petechiae / drainage) - scant clear
 Tonsils abnorm N Y (1+ 2+ 3+ 4+ / exudates)
 Lungs clear N Y (ronchi Rt - Lt / rales Rt - Lt / wheezes Rt - Lt / stridor insp / exp : Rt / Lt)
 Heart normal N Y (murmurs: 1 / 2 / 3 / 4 / 5 / 6 ; clicks; rubs; other: _____)
 Other: _____

- A:
- | | | |
|--|---|--|
| <input type="checkbox"/> Adenopathy (785.6) | <input type="checkbox"/> Infectious mono (075) | <input type="checkbox"/> Pneumonia, unspec (486) |
| <input type="checkbox"/> Aphthous ulcer (528.2) | <input type="checkbox"/> Influenza (487.1) | <input checked="" type="checkbox"/> Rhinitis, purulent (472.0) |
| <input checked="" type="checkbox"/> Asthma (493.9) | <input type="checkbox"/> Laryngitis (464.0) | <input checked="" type="checkbox"/> Rhinitis, allergic (477.9) |
| <input type="checkbox"/> Status Asthmaticus ? | <input type="checkbox"/> Otitis externa (380.10) | <input type="checkbox"/> Sinusitis, acute: (461.9 unspec) |
| <input type="checkbox"/> Bronchitis (466.0) | <input type="checkbox"/> Otitis media, acute nonsuppur (381.00) | <input type="checkbox"/> Maxillary (461.0) |
| <input type="checkbox"/> Bronchospasm (519.1) | <input type="checkbox"/> Otitis media, acute suppur (382.00) | <input type="checkbox"/> Frontal (461.1) |
| <input type="checkbox"/> Conjunctivitis, acute (372.03) | <input type="checkbox"/> Pharyngitis, acute (462) | <input type="checkbox"/> Ethmoid (461.2) |
| <input type="checkbox"/> Conjunctivitis, allergic (372.05) | <input type="checkbox"/> Pharyngitis, Strep (034.0) | <input type="checkbox"/> Sinusitis, chronic (473.9) |
| <input type="checkbox"/> Cellulitis, face (682.0) | <input type="checkbox"/> Tonsillitis (463) | <input type="checkbox"/> Stomatitis (528.0) |
| <input type="checkbox"/> ETD (381.81) | <input type="checkbox"/> Tonsillar abscess (475) | <input type="checkbox"/> URI (465.9) |
| <input type="checkbox"/> Other: OCP RF | | <input type="checkbox"/> Wax impaction (380.4) |

P: likely allergy flare causing Δ in RAD baseline

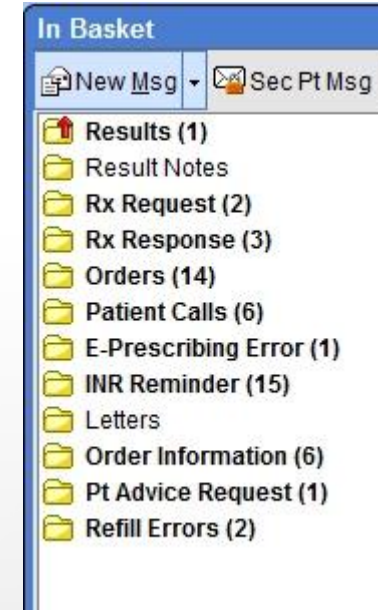
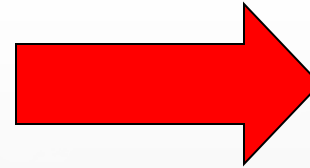
Increase clear liquids Tylenol / Ibuprofen
 Gargles (saline / peroxide / antiseptic) Saline irrigations, nasal (QID)
 Antihistamines/Decongestants: Trihal Allegra D # 20 pm (QD / BID / TID / QID)
 Guaifenesin: _____ # _____ (QD / BID / TID / QID)
 Antibiotic: _____ mg # _____ (QD / BID / TID / QID)
 Cough/antitussive: ventilyn RF # _____ oz _____ tsp (BID / TID / QID)
 Oral / Nasal spray: _____ # 3 _____ puffs (QD / BID / QID)

Naturopathic Tx: Zinc, Echinacea, Eucalyptus, Ginger, Cinnamon, Co-Q 10, Grape seed, _____
 Nebulizer therapy _____ Spirometry _____ % Repeat Pulse Ox _____
 Return in 1 / 3 / 5 / 7 / 10 days if no improvement. Call if sx's worsen! - Set WVE in Oct. Rev PFT
 Rapid Strep Screen: ++ / --- Throat culture / nasal culture / nasal smear / gram stain @ eval.
 Spirometry/PFT; _____ CXR; _____ CBC; _____ Mono spot; _____ Chem 20; _____ Mycoplasma antib
 Other: kenalog 0.5% cream AKA PPD - tint & face.
Ref to Derm for consult in facial eczema. tx.

Evolution



The New In Basket

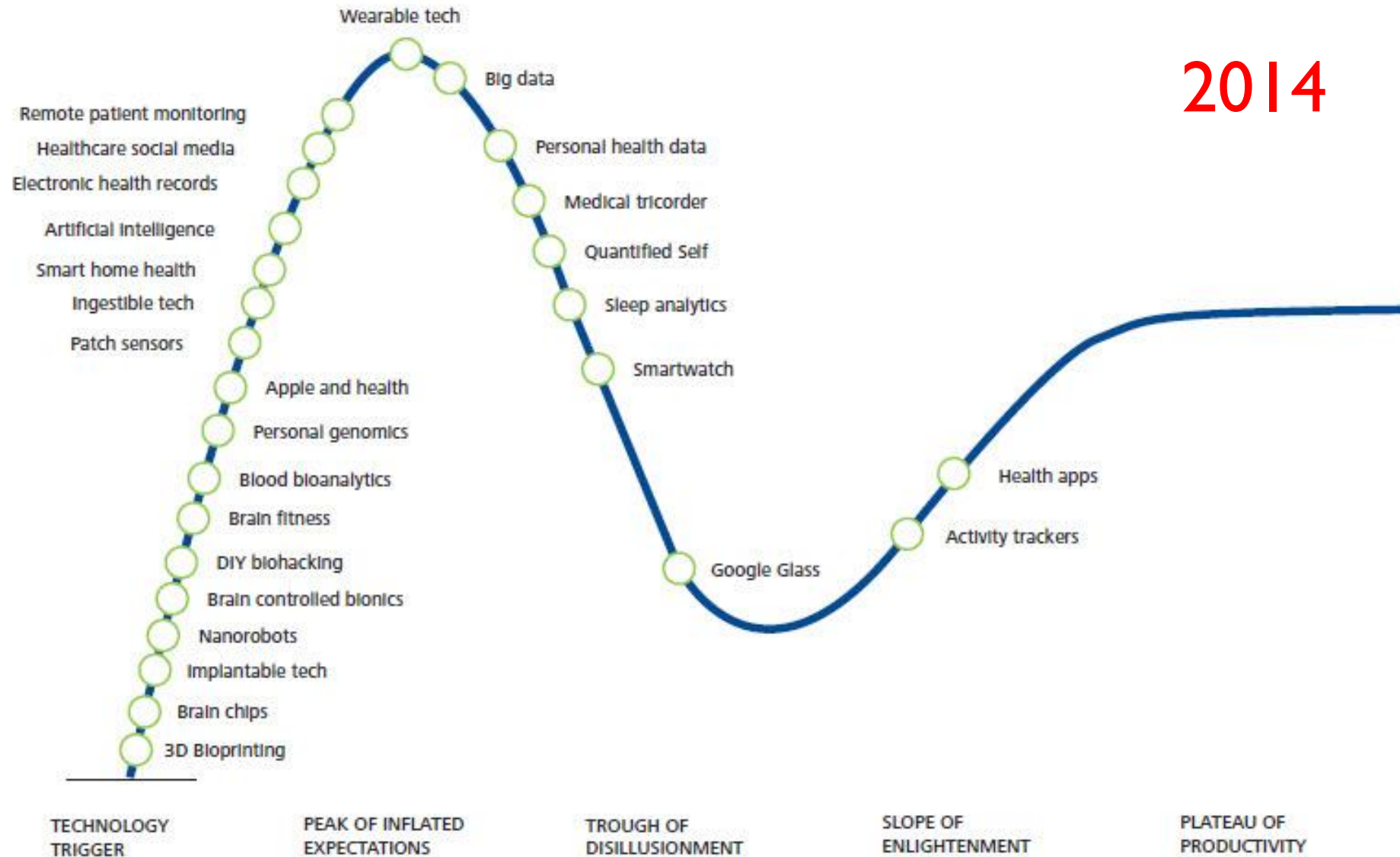




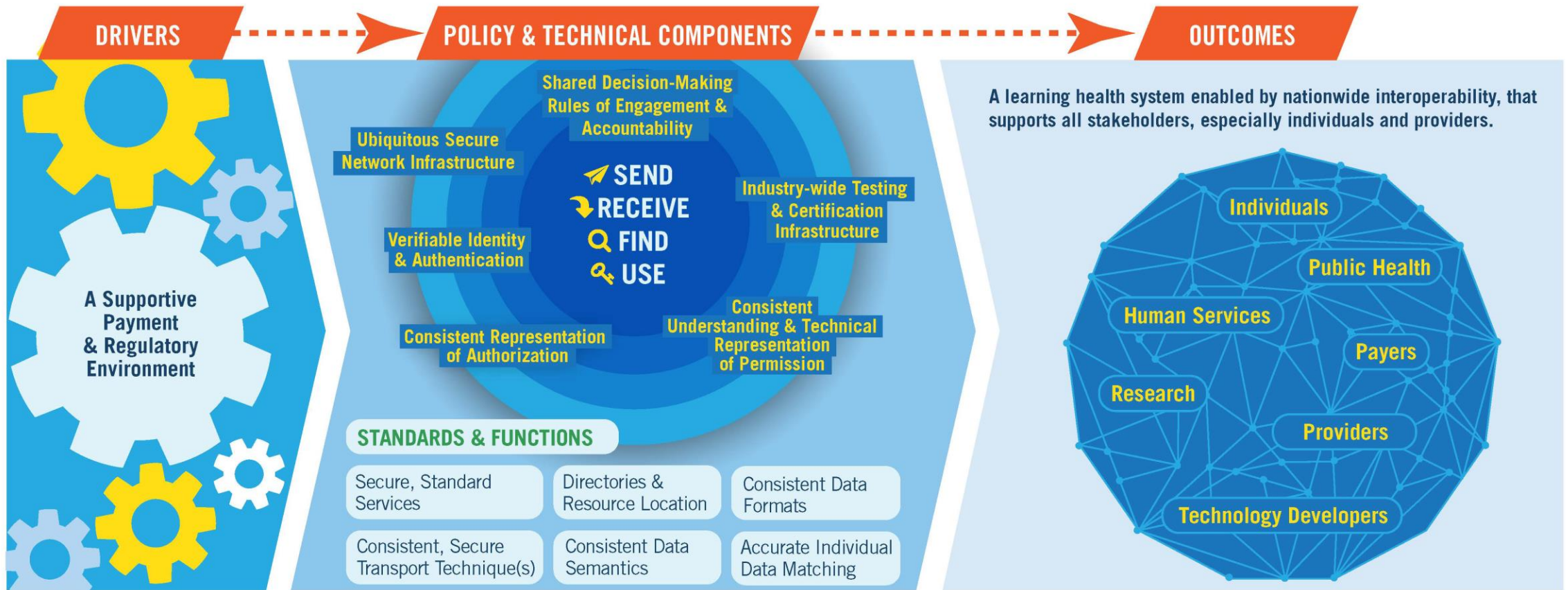
Its not just a medical transcript...

It's a living, breathing, climbing document

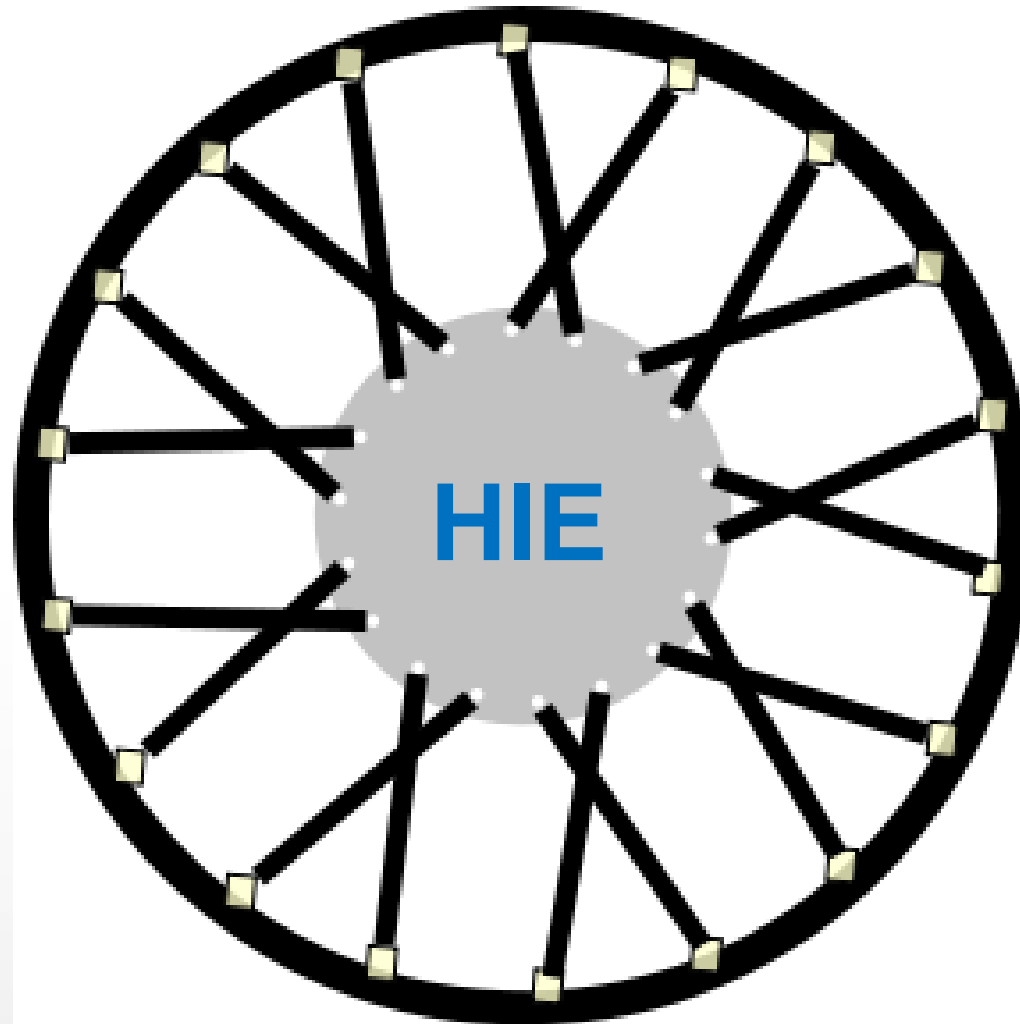
The 2014 Hype Cycle for digital health technologies¹⁰⁰



Source: Digital Health Hype Cycle, Bionicy, 2014



Connecting Health and Care for the Nation
A Shared Nationwide Interoperability Roadmap
FINAL Version 1.0 (ONC, 2015)





BSMH “Community Connect” Program Overview

We build trusted partnerships with community providers, founded upon extension of our proven EHR platform, clinical content, and best practice workflows, to provide high value healthcare solutions and services in response to both customer and consumer demands.

Philosophy on EHR Offering

- We deliver our standardized EHR platform based on over a decade of experience
- Enhance operational performance by leveraging leading clinical practices through an integrated system
- Enable delivery of a comprehensive personal health record for all patients, wherever care is delivered
- Standard build allows for ability to optimize and increase functionality in a timely manner
- Optimization of revenue cycle operations for timely and accurate reimbursement

Standard High Level Cost Components

- One time License Fees
- License Maintenance Fees (monthly)
- Implementation Fees
- Data Center Infrastructure Fees (impacted by direct connection vs. customer WAN connection)
- Implementation and Ongoing Support Fees Provides (including interfaces and other integration)
- 3rd Party Application Fees (e-prescribing, patient instructions, drug database, coding sets)

The Hamilton County Public Health Experience

Questions?