Engaging Physicians in Large-Scale Improvement: Lessons Learned from Cincinnati Children's PHO

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> National Health Information Technology and Delivery System Reform Summit Washington, D.C.

> > June 28, 2010





Objectives

 Review key drivers for accelerating and sustaining physician engagement in large-scale improvement initiatives.

 Share perspectives on how we've operationalized the key drivers.

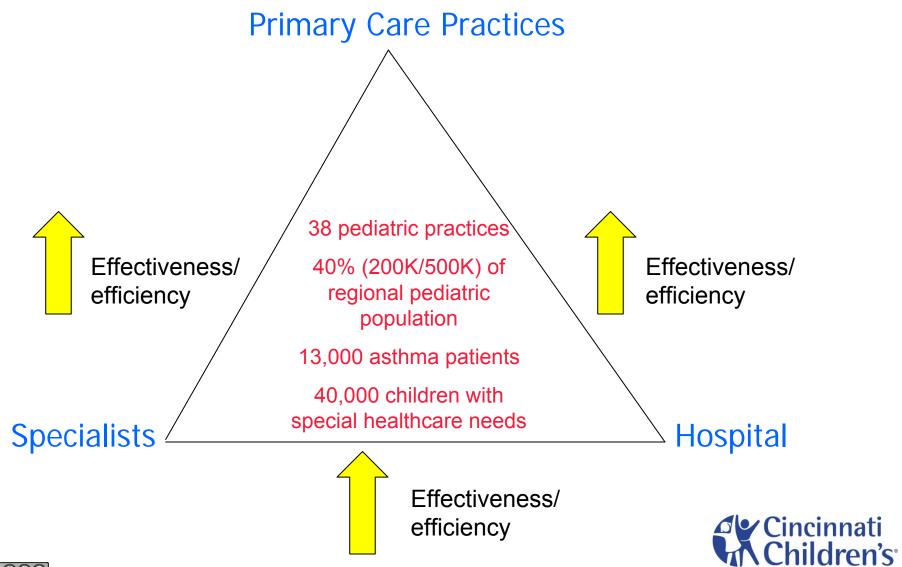


Growing National Focus on Accelerating Physician Engagement in Large-Scale Improvement

- Beacon (CMS/Office of National Coordinator for Health Information Technology).
- Accountable Care Organizations (CMS).
- CMS Innovation Center.
- Aligning Forces for Quality (RWJ Foundation).
- Improving Performance in Practice (RWJ Foundation).
- Triple Aim (Institute for Healthcare Improvement).



PHO: Background/Structure





PHO Asthma Initiative: Network-Level Key Driver Diagram

AIM

To improve evidence-based care for 13,000 children with asthma across 39 primary care practices (40% of regional pediatric population), with over 90% of all-payor asthma population receiving "perfect care" (composite measure), thus reducing asthma-related ED/urgent care visits, admissions, acute office visits, missed school days, missed work days, and activity limitation; and, improving parent/patient confidence and degree of asthma control

AIM

To strengthen improvement knowledge/capability within primary care practices, thus enhancing sustainability of current and future improvement efforts



KEY DRIVERS/INTERVENTIONS (high scalability focus)

Physician **leadership** at Board and practice level

Network-level **goal setting** by Board (network-level performance defines success)

Measurable practice participation **expectations/requirements** (linked to **ABP-MOC** approval, **reward programs**)

Multidisciplinary practice quality improvement teams

Web-based **registry**, with all-payor population identification/reconfirmation

Real-time patient, practice, and network-level data/reporting

Transparent, comparative practice data on process and outcome measures

Concurrent data collection/use of decision support tool through high reliability principles/workflow changes (disconfirming data)

Aligning P4P/incentive design with improvement objectives

Evidence-based care ("perfect care" composite measure)

Population **segmentation**, with significant focus on "high-risk" cohort

Cross-practice **communication/shared learning** to spread successful interventions

Integration of multiple administrative/electronic **data sources** (hospital, practice, payor)

Network and practice-level **sustainability** plans



Keith Mandel, MD; Cincinnati Children's Hospital Medical Center

Key Drivers that Accelerate/Sustain Physician Engagement in Large-Scale Improvement

- Moving the "big dots."
- Highly engaged collective leadership group across sites.
- Reward models aligned with large-scale improvement aims/goals.
- Highly scalable, sustainable interventions.
- Reliable, accurate, trusted data collection and reporting systems.
- Coaching/supporting formal and informal physician leaders.



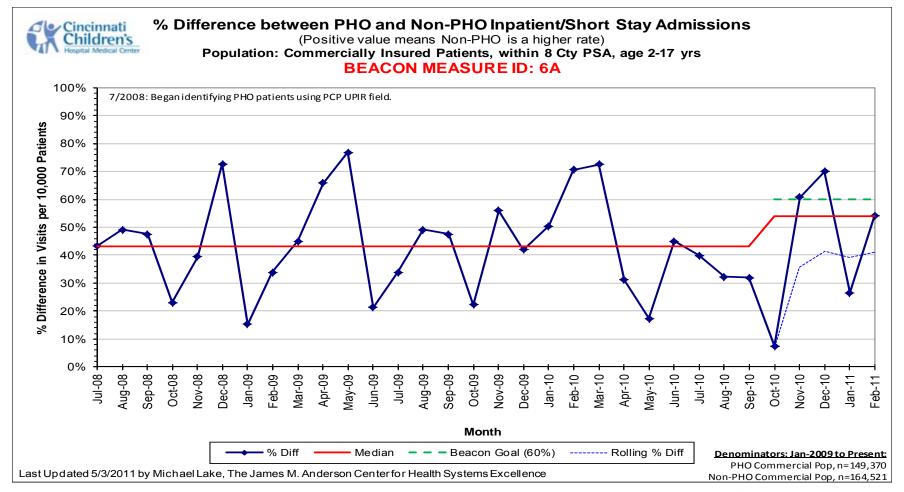
Key Driver

MOVING THE "BIG DOTS"!!





PHO vs. Comparison Group: % Difference in Asthma Admission Rate (monthly data)







PHO Network: Asthma Outcome Measures

Population-Based Measures

(Network all-payor asthma population = 12,668)

	Baseline 8/04 - 7/05	Current 4/10 - 3/11	%∆	
% parents missing ≥ 2 work days due to child's asthma over prior 6 months	18.0%	10.2%	43% ↓	
% parents rating confidence in managing child's asthma < 7/10	11.1%	5.8%	48% ↓	
% asthma population missing ≥ 2 school days due to asthma over prior 6 months	26.5%	18.6%	30% ↓	
% activity limitation reported as "not at all" or "a little of the time"		89.0%		
% receiving oral steroids within prior 12 months	Not captured as these	20.1%		
% parents rating asthma as "well" controlled	questions were initiated 93.7%		n/a	
% physicians rating asthma as "well" controlled	in June 2006	90.2%		
% parent and physician agreement on rating degree of asthma control		92.2%		





PHO Network: Asthma Process Measures

(as of June 23, 2010)

Population-Based Measures (Network all-payor asthma population = 12,636)		Literature
% of asthma population with flu shot:		
2010-2011 flu season	67%	
2009-2010 flu season	66%	
2008-2009 flu season	66%	
2007-2008 flu season	60%	10-40%
2006-2007 flu season (delayed vaccine delivery)	54%	
2005-2006 flu season	62%	
2004-2005 flu season	40%	
2003-2004 flu season (baseline)	22%	
% of asthma population with management plan	94%	50%
% of population with "persistent" asthma on controller medication*		97%
% of asthma population with severity classified	96%	50%
% of asthma population receiving "perfect care" **	93%	not available

^{* &}quot;Persistent" asthma defined per NHLBI severity classification criteria.

^{** &}quot;Perfect care": composite measure of severity classification, written management plan, and controller medications (if patient has "persistent" asthma)





Key Driver	Interventions that Accelerate/Sustain Physician Engagement in Large-Scale Improvement
Highly engaged collective leadership group across sites	All aspects of QI design/execution informed by key physician leaders/front-line and through testing with pilot sites.
	Monthly, data-driven leadership group reviews of project status.
	Leadership group decisions to scale-up/spread interventions across sites predicated on high degree of belief/confidence that interventions have positively impacted care/outcomes.
	"Success" = aggregate + site level improvement in process and outcome measures.
	"Success"/improvement goals embedded in design of reward and MOC programs (environmental trends leveraged).
	Robust, measurable QI participation goals/expectations to which they hold themselves accountable.



Key Driver	Interventions that Accelerate/Sustain Physician Engagement in Large-Scale Improvement
Reward models aligned with large-scale improvement aims/goals	Provider-driven/payor partnership model with design characteristics directly aligned with those of large-scale improvement initiatives (QI design = reward design).
	QI initiative measures/data = reward measures/data (all-payor denominator focus)
(disruptive innovation)	Leadership group/providers highly confident in QI design, QI/IT infrastructure, and execution.
	Portion of site-level rewards linked to aggregate measures/goals (to accelerate diffusion of interventions and drive shared accountability for improving outcomes).
	Rewards also linked to "foundational" QI efforts that promote improvement capability and sustainability (e.g., registries, highly reliable use of decision support/data collection tools).





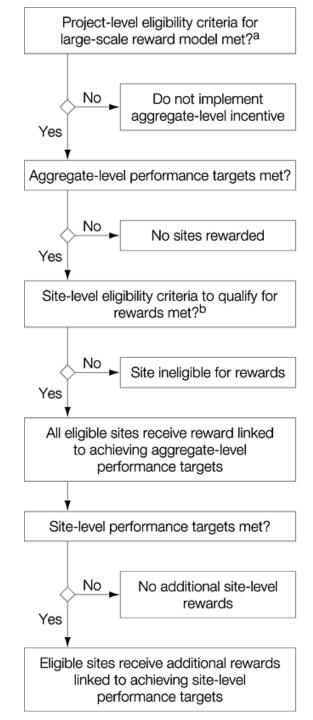
JAMA—February 17, 2010

Aligning Rewards With Large-Scale Improvement

Keith Evan Mandel, MD

NTENSIFIED HEALTH CARE REFORM EFFORTS INCREASE THE urgency to achieve significant improvements in quality and substantial cost savings at the national level. Yet the pace of executing and spreading effective improvement interventions makes it unlikely these outcomes will be achieved in the foreseeable future. Although frameworks for large-scale improvement have been described by the Institute of Medicine, Commonwealth Fund, and others, there is limited evidence about how to design and implement system changes that improve population-based quality measures while also overcoming challenges inherent to large-scale change. Even though there is increasing evidence from innovation networks, improvement collaboratives, and national improvement campaigns about what works, the likelihood of achieving regional, state, or nationallevel improvement goals is limited without disruptive strategies that accelerate large-scale diffusion of effective interventions 1-3 Shifting the focus to rewarding sites (eg. primary) practices committed to defining overall success as achieving improvement goals for network-level process and outcome measures. Board discussions of the aggregate-level incentive triggered an intense focus on overall design of the improvement initiative, because committing to networklevel improvement required successful execution of strategies for developing, testing, and spreading interventions. An example of this effect was board approval of sharing transparent comparative practice data on process and outcome measures within 6 months of project inception. The aggregate-level incentive also promoted learning across practices that accelerated the spread of successful interventions; pushed early adopter practices to even higher performance levels to increase the likelihood of achieving aggregate-level performance thresholds; accelerated engagement of practices in the improvement initiative; and helped sustain focus on improvement relative to the all-payer population denominator within and across practices.

Based on the Cincinnati experience, aggregate-level



^aProject-level eligibility criteria

- Leadership commits (within and across sites) to defining success as improving aggregate-level performance
- Centralized infrastructure exists to promote shared learning and interaction between sites
- Transparent comparative site data exists on process and outcome measures
- Purchasers and payors represent significant proportion of population of focus and support linking rewards to aggregate-level performance
- Measure specifications standardized across sites
- Reliable and accurate data collection and reporting systems implemented across sites
- Centralized database or registry used to generate aggregate-level performance measures at regional, state, and/or national level
- 8. Evidence exists linking interventions to improvement in outcome measures
- Evidence exists that spread and adoption of defined interventions improves population-based measures

JAMA

Mandel, K. E. "Aligning Rewards with Large-Scale Improvement"

February 17, 2010

^bSite-level eligibility criteria

- Commitment to public transparency of process and outcome measures
- Improvement intervention details and tools posted to shared Web site for other sites to access
- Monthly reporting of highly reliable and accurate data
- Participation in multisite, shared learning forums

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Interventions that Accelerate/Sustain Physician Engagement in Large-Scale Improvement

Highly scalable, sustainable interventions

Combined decision support/data collection tools implemented at point of care at high reliability level (avoids data collection being un-linked from improvement efforts).

Decision support/data collection tools generate "disconfirming data" from patients/families at point of care that significantly impacts clinical decision-making.

High degree of belief/confidence established among opinion leaders/peers that interventions have positively impacted care/outcomes (combined with strong evidence/data).

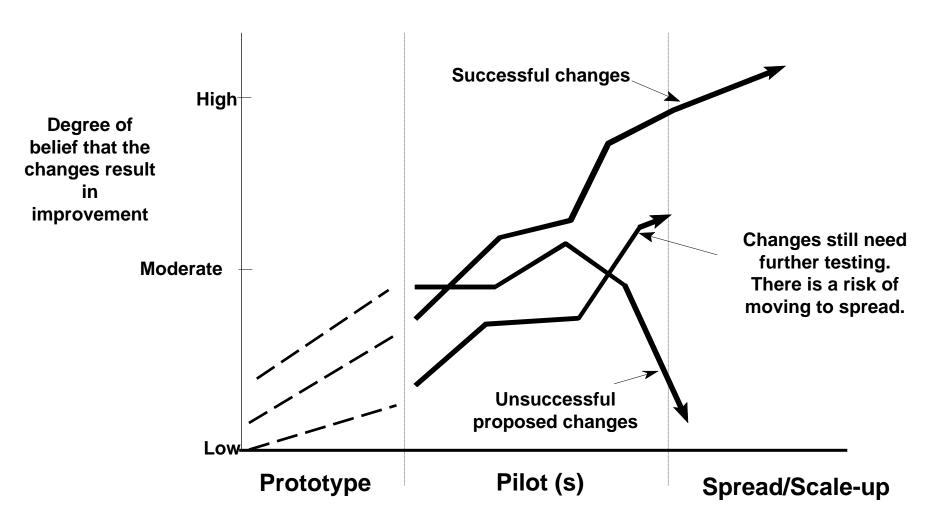
Diffusion of innovation principles (Everett Rogers' work) used to achieve "tipping point" and diffuse interventions across adoption curve/adopter categories (not about shifting individuals/sites position on adoption curve).

Interventions not totally dependent on IT infrastructure/interfaces.

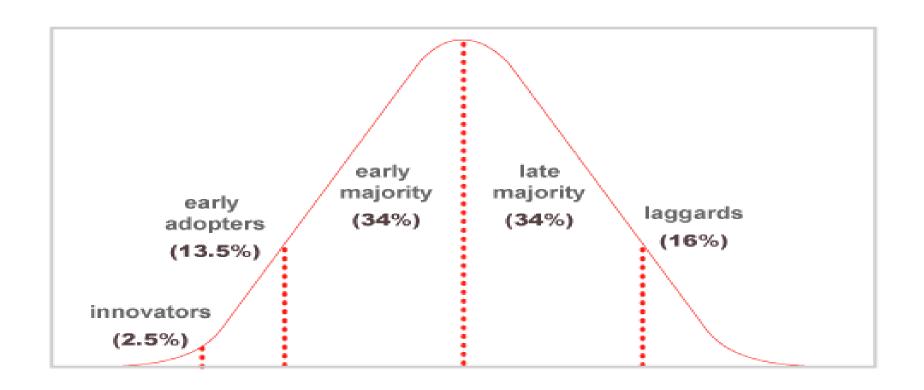




Spread/Scale-Up Trajectory











V D:	
Key Driver	Interventions that Accelerate/Sustain Physician Engagement in Large-Scale Improvement
Reliable, accurate, trusted registry/data collection and reporting systems	Centralized, web-based registry that supports aggregate, site, comparative site, and patient level measurement/improvement (avoid dependency on executing all IT interfaces).
	Measures/reports updated real-time and accessible 24/7.
	Transparency of comparative site data for process and outcome measures.
	Registry/measures populated with combination of self-reported and administrative data.
	Systematic, reliable processes for maintaining accurate data/measures (e.g., reconfirming population denominators, site-level attribution).
	Comparison group data tracked to more accurately discern improvement and to more powerfully communicate impact.





Key Driver

Coaching/supporting formal and informal physician leaders!!



"The Triple Aim: Care, Health, and Cost" (Berwick, Nolan, Whittington; *Health Affairs*, 2008):

"The great task in policy is not to claim that stakeholders are acting irrationally, but rather to change what's rational for them to do."

"Encourage integrated behavior, without needing to change organizational structures."



"Be the Best at Getting Better"

Lee Carter, Former Board Chair, Cincinnati Children's



Thanks!

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