

Workforce Optimization

Four Opportunities to Move Children's Hospitals Toward High Reliability Organizations

In a series of white papers CHA will highlight tools to assist children's hospital executives in their efforts to become high reliability organizations (HROs). We begin with a look at four specific opportunities, and in subsequent white papers we'll delve into best practices, data, and new technologies relating high reliability and workforce development.

The [characteristics of HROs](#) include:

1. Preoccupation with failure
2. Reluctance to simplify
3. Sensitivity to operations
4. Deference to expertise
5. Commitment to resilience

We invite you, as human resource and insurance executives, to participate in the conversation with us by providing case studies, identifying collaborative opportunities and sharing new ideas throughout the year.

The evolution to high reliability alongside the Quadruple Aim:

Children's hospitals' movement toward high reliability began with a systems approach to address highly complex processes, technologies and work. This systems approach built upon previous work addressing the Triple Aim—improved health, better care, smarter spending—which involved implementing new processes, adopting new tools and enhancing employee skill sets. The acceleration of this movement heightened after a 2014 *Annals of Family Medicine* [article](#), “From Triple to Quadruple Aim: Care of the Patient Requires Care of the Provider.” Adding this fourth aim to recognize the pivotal role of workforce well-being lays the foundation for HROs. HROs in health care largely depend on people systems, and people are our most important, expensive and variable resource. The connection between workforce development and becoming a HRO is critical.

Collective opportunities for children's hospitals:

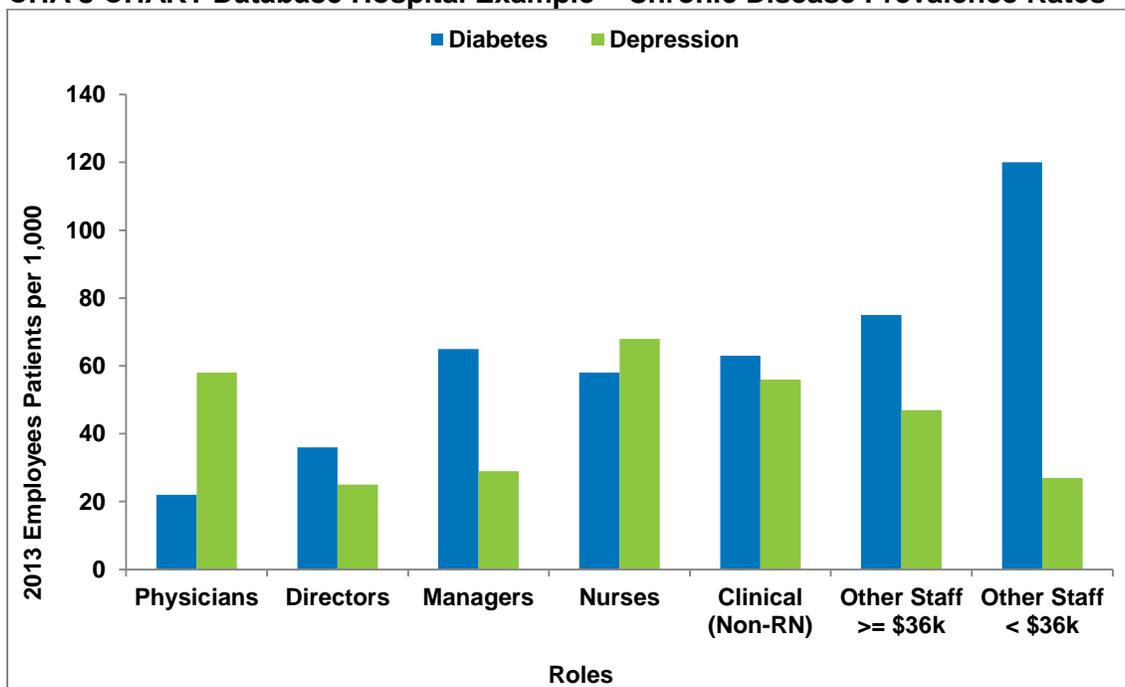
If we collaborate through further discussions, expanded data resources and improved analytics, we will all get to high reliability faster. Here are four foundational opportunities related to workforce optimization to build on this future.

Opportunity #1: Workforce Well-being Analytics

What if we could use analytics to more precisely target efforts to improve employee well-being? For example, 46 percent of physicians experience burnout in the U.S. We know specific categories of children’s hospital employees—physicians and nurses—experience higher prevalence of depression (58 per 1,000 employees) than other categories, such as managers (18 employees per 1,000). And, rates of diabetes vary even more significantly across employee categories. We know the health care utilization trends of the workforce signal the need for improved wellness and prevention activities. Using data, we can share the knowledge, policies and training most aligned with a greater sense of personal accomplishment and lower stress levels among the workforce.

[Let us know](#) any analytics you’ve used to evaluate workforce well-being.

CHA’s CHART Database Hospital Example – Chronic Disease Prevalence Rates



Opportunity #2: Data Driven Staffing Models

This opportunity aligns the ever increasing volume of data with the need for high-level, action-oriented insights. By pooling information across the children’s hospitals, individual organizations can pinpoint activities to better understand people and data and drive efficiencies. CHA’s benchmarking experience shows that comparisons with like organizations provide the best opportunity to uncover trends, identify underlying causes of variability and create future scenarios. We are at the cusp of using data to guide workforce processes and more efficient staffing models. With further collaboration on the data points

and techniques necessary for implementable insights, children’s hospitals can work smarter to enable lasting results.

CHA Benchmark Data – 18 Pediatric Peers

Utilization | Volumes (11) and Metrics

Raw Data	Metrics
Staffed beds	ADC
Inpatient Days	ALOS
Observation days	APD
ED Visits	AOB
Surgical Cases	
Other Outpatient Visits	

Staffing | FTEs on Payroll (9)

Raw Data	Metrics
RNs, LPNs, Nursing Assistants, Agency	per AOB
Licensed Independent Practitioners	distribution
Physicians, Residents, Fellows	

Financials | (24)

Raw Data	Metrics
Gross Revenue and NPR	per APD
Bad Debt and Charity Care	distribution
DSH and CHGME	
Expenses	
Operating Profit	
Net Operating Income	

Nursing Unit | (14)

ICUs, Hem/Onc/BMT, Burn, Rehab, Psych

Raw Data	Metrics
Patient Days	ADC
Staffed beds	Occupancy Rate



Payers | (24)

Medicaid, Other Gov, Private Ins, Other Non-Gov, and Self-Pay

Raw Data	Metrics
Inpatient Days and Discharges	ADC
Observation Days and Cases	ALOS
ED Visits, Other Outpt visits	distribution
Gross and Net Revenue	

Characteristics | (122)

Services Provided (82)	Specialty Programs (11)	Boarded Specialties (29)
Fetal medicine and Genetics	NICU Level	Hospice and Palliative Medicine
Obstetrics/High-risk Obstetrics	Designated Trauma Level	Pediatric Endocrinology
Vent-dependent Children	Verified Trauma Level	Child and Adolescent Psychology/Psychiatry
Care Coordination/PCMH	Types of Transplants	Pediatric Transplant Hepatology

Opportunity #3: Training Aligned with Quality Appraisal

This opportunity relates to the maturation of quality and safety appraisal systems over the past five years. With more sophisticated tools addressing quality and safety awareness, children’s hospitals, now more than ever, understand the activation points and vulnerabilities associated with keeping patients safe and improving the quality of care. The workforce must now be operationalized to address these vulnerabilities. This requires philosophical insights as well as options for enhanced employee training on high-risk prevention. As an example, industry studies now correlate staffing and management patterns with hospital acquired conditions.

Let us know your successes in marrying quality and safety data with employee training.

Opportunity #4: Tools and Technology for Recruitment and Retention

This opportunity emphasizes the proliferation of operational tools and technology targeting HR benefits and workforce efficiency. Emerging on-demand, vendor-based benefits tools can address the next generation's need for more fluid benefits structures and perhaps disrupt traditional employer-based offerings. New technologies can address projected health care labor shortages and enhance retention strategies. HR and benefits executives will be instrumental in marrying emerging tools and technology with the unique attributes of the children's hospitals' workforce.

One recent retention example is the [CHA announcement of a survey project with Press Ganey](#). Employee engagement survey results will be combined with member hospital operations data to better design programs targeting employee engagement and stress.

These four opportunities showcase the next steps for children's hospital leaders who want their organization to embrace complexity and simplify it—a basic tenant of a high reliability organization. We'll continue the conversation on the power of CHA Insurance Services and its members to leverage knowledge, data and buying power.

Send your thoughts on these opportunities and potential further analysis to:
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