Bridging the Gap on Health and Community Development:
Building Communities Based on Wellness

Robert Kahn
Associate Chair for Community Child Health
Cincinnati Children’s Hospital Medical Center
June 18, 2015
Influences on Health: Broadening the Focus

Economic & Social Opportunities and Resources

Living & Working Conditions in Homes and Communities

Medical Care

Personal Behavior

HEALTH

Vision
Be the leader in improving child health

High Level Measures
By June 30 2015,
• Reduce the use of the ED and inpatient services by 20% in children with asthma covered by Medicaid
• Discuss work at
  • County
  • Clinical
  • Neighborhood

Population Health Initiative
Hamilton County: 190,000 children age 0-17yrs
Asthma admissions to Cincinnati Children's Hospital, children ages 1-16, Hamilton County (2010-2012)

County sub-areas
Admission rate per 1,000
- 0.0-1.9
- 1.9-6.0
- 6.0-9.2
- 9.2-26.7

Source: Cincinnati Children's Hospital Medical Center, U.S. Census Bureau
A. Beck & J. Besl (2013)
Children from RED neighborhood:
- 5x more likely to live in poverty
- 5x more likely to lack reliable transportation
- 8x more likely to be substandard housing

Asthma admission rate per 1,000 children (by neighborhood)
CINCY URBAN APARTMENTS
1003 Lincoln Avenue
Cincinnati, Ohio 45206
(513) 221-1212
(513) 221-4121 FAX

NOTICE TO ALL RESIDENTS

May 24, 2010

At this time all residents are not permitted to install any a/c units for your apartment.

Anyone with an a/c unit will be evicted immediately.

Thank you
Management
Housing and health

Upkeep neglect bedevils tenants

Written by
Lisa Bernard-Kuhn
lbernard@enquirer.com
1:01 PM, Mar. 12, 2011
Cincinnati Asthma Admissions and Neighborhood Asthma Hotspots

Asthma admissions 9/1/10-8/31/11

- Asthma admissions
- City of Cincinnati

**Admission rate per 1000**
- 0.00 - 0.78
- 0.79 - 3.40
- 3.41 - 5.76
- 5.77 - 10.99
- 11.00 - 27.24
- Census tract

Northside Clinic
Hopple St. and Millvale
Price Hill Clinic
Elm St. Clinic
Mt. Auburn
Crossroads
Walnut Hills
PPC
Using Quality Improvement to enhance partnership

<table>
<thead>
<tr>
<th>% of successful handoffs</th>
<th>Jan-14</th>
<th>Feb-14</th>
<th>Mar-14</th>
<th>Apr-14</th>
<th>May-14</th>
<th>Jun-14</th>
<th>Jul-14</th>
<th>Aug-14</th>
<th>Sep-14</th>
<th>Oct-14</th>
<th>Nov-14</th>
<th>Dec-14</th>
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<tbody>
<tr>
<td>Success Rate of Referrals to Intake</td>
<td>Rate</td>
<td>100%</td>
<td>100%</td>
<td>100%</td>
<td>100%</td>
<td>94%</td>
<td>100%</td>
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<tr>
<td># of Referrals</td>
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<td>In both Epic &amp; Pika</td>
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<td>54</td>
<td>66</td>
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<td>75</td>
<td>79</td>
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Beginning of slide:

### Avondale and Asthma – Neighborhood approach

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<th>Days Since Previous Utilization</th>
<th>Date of Utilization</th>
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<td>01/10</td>
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<tr>
<td>0/07</td>
<td>01/17</td>
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<tr>
<td>0/33</td>
<td>12/18</td>
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</tbody>
</table>

181 total utilizations – 130 ED visits, 51 admissions

End of slide.
“Heat map” of building code violations
Avondale

CHOICE Buildings being refurbished by The Community Builders

Beck (2014)
Decrease the weekly number of ED visits among youth who reside in five TCB Choice Apartment Buildings in Avondale from 4.5 to 3 by Nov. 5, 2014

The Community Builders, Inc.
Avondale Comprehensive Development Corporation
Urban League of Greater Cincinnati
CCHMC
- Community Relations
- General Pediatrics
- Emergency Department
- Hospital Medicine
Other health conditions in Hamilton County

Annual Inpatient Psychiatric Admission Rate per 1,000 Children aged 3 to < 18 years
(December 2011 - November 2014)
County asthma admissions - Medicaid

Rolling 12 Month Average Number of Admissions per 10,000 Hamilton Co. Medicaid Patients age 2 through 17 years old

Baseline – 7.2
20% reduction – 5.8
Current – 4.7

Last update: 09-19-14 by T. Cole    Data source: Epic
Lessons on Bridging the Gap on Health and Community Development

- Shared vision – improved health and well-being
- Population denominator, neighborhood approach
- Network of partnerships to ‘co-produce’ health
- Funding – hospital, foundation, payment reform, community development
Thank you!

- Robert.kahn@cchmc.org
- @docrob64
- Cincinnati Children’s Hospital Medical Center
- 513-636-4369
Decrease ED Visits among youth in 5 TCB Buildings in Avondale
August 2013 - October 2014

# of ED Visits / Week

Week

- Flu season begins
- Flu season ends
- PDSA #1: Appt. Setting
- PDSA #2: Healthy Lifestyles
- PDSA #3: UC/ED Tool

# of ED Visit
- Median
- Goal
Helping families choose the best care option

Key Driver Diagram (KDD)

**Project Leader(s): Tori Ames**

**Revision Date: 11/5/14 (v1)**

**SMART Aim**

Decrease the weekly number of ED visits among youth utilizing the CCHMC ED who reside in five TCB Choice Apartment Buildings* in Avondale from 4.5 to 3 by Nov. 5, 2014.

Population: TCB Avondale youth

**Global Aim**

Improving quality of life by helping families choose the best care option

**Key Drivers**

- Strong community member/partners support
- Increased trust
- Family-friendly, relevant communication
- Healthy lifestyle/environment
- Culturally competent Care

**Interventions (LOR #)**

- Scheduling Annual Well Child Appointments (2)
- TCB Healthy Lifestyle challenge (2)
- Flu Shot Consent and Event (2)
- Urgent Care Education (1)
- SBHC Consent Forms Signed (1)

**Key**

- Gray shaded box = completed intervention
- Green shaded box = what we’re working on right now

LOR # = Level of Reliability Number, e.g., LOR 1

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Rapid Cycle Improvement Collaborative (RCIC)

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Who are the critical partners?

- Legal Aid Society
- Community Development Corp
- Pharmacies
- Cincinnati Public Schools
- Cincinnati Health Department
- Community health workers
- United Way and Place Matters
- Job training, GED programs
Building code violation density

Northside

Avondale

Price Hill

OTR
Building code violation density & Asthma admissions and ED visits (2008-2011)