Concepts of Co-Management: A primary care journey to improve asthma care for its pediatric population

Deborah McWilliams, MD
Community Pediatrics and Adolescent Medicine
Mayo Clinic
Rochester, MN
Objectives

1) Explain the development of Pediatric Asthma Care Coordination at Mayo Clinic - Employee and Community Health (ECH) in Rochester, MN

2) Use this example of asthma Care Coordination as an example of co-management between the Health Care Home and subspecialty practice
Who are we?

- Integrated medical practice
  - “Employee and Community Health” (6 clinic sites)
  - At Mayo Clinic, Rochester
  - 4 departments (Peds, Int Med, Fam Med, Psych)
  - Patients >50% Employees/Dependents
  - Academic Medical Center:
    - Internal Medicine (96 residents), Pediatrics (42 residents), Family Medicine (24 residents), Medical Students
- 465 staff members
- 140,000 patients in our panels (40,000 kids)
- 300,000 office visits per year
- 1,000,000 patient contacts (non-visit care)
• Standardized approach to care via RN Asthma Care Coordination:
  ○ Started at site 1: 2009
  ○ Last site enrolled: 2011

• First year: results for those with more than 1 assessment
  ○ “Well controlled” symptoms: 54% → 85%
  ○ “Not well controlled symptoms: 34 → 11%”
  ○ “Very poorly controlled symptoms: 13 → 4%”
  ○ Average “impact on activity” dropped
Work/School days missed = “financial payoff”
## MNCM Scores

<table>
<thead>
<tr>
<th>Location</th>
<th>2011</th>
<th>2012</th>
<th>2013</th>
</tr>
</thead>
<tbody>
<tr>
<td>Community Pediatrics</td>
<td>70%</td>
<td>73%</td>
<td>77%</td>
</tr>
<tr>
<td>Baldwin Family Medicine</td>
<td>45%</td>
<td>56%</td>
<td>83%</td>
</tr>
<tr>
<td>NE Clinic</td>
<td>24%</td>
<td>82%</td>
<td>89%</td>
</tr>
<tr>
<td>NW Clinic</td>
<td>77%</td>
<td>80%</td>
<td>88%</td>
</tr>
<tr>
<td>Kasson</td>
<td>54%</td>
<td>70%</td>
<td>81%</td>
</tr>
<tr>
<td>Subspeciality</td>
<td>22%</td>
<td>50%</td>
<td>58%</td>
</tr>
<tr>
<td>Statewide Average</td>
<td>24%</td>
<td>37%</td>
<td>?</td>
</tr>
</tbody>
</table>
“All or none” MNCM metrics for our entire population (even tho
What is the real “story”? 

1) Changing landscape
2) Assessing current needs of our practice
3) Putting a structure into place
4) Aspects of Spread
Principles of Co-management

- Subspec-Primary Care partnership (“collaborative care partnership”)

- Agreement on a standard of care
  - Evidenced-based, consensus-based when needed.

- Roles explicitly defined
  - Most appropriate use of each resource

- Patient registry
Principles of Co-management

- Structured tool to communicate
- Local champions embedded on each care team
- Leadership support
  ECH expectations
Prevalence: 12% Olmsted Co

Relatively low ER/Hosp utilization for asthma
- Hosp 0.2/1000
  - Healthy People 2010 Target 0.8/1000
- ER 0.8/1000
  - Healthy People 2010 Target 1.7/1000
Reality Check

1) Changing landscape
2) Assessing current needs of our practice
3) Putting a structure into place
4) Aspects of Spread
1) Changing landscape
2) Assessing current needs of our practice
   - Challenging our assumptions
   - Critical self-assessment
   - New Rules
3) Putting a structure into place
4) Aspects of Spread
Reality Check

- **Prevalence**: 12% Olmsted Co

- **Relatively low ER/Hosp utilization for asthma**
  - Hosp 0.2/1000
  - ER 0.8/1000
  - Healthy People 2010 Target 0.8/1000
  - Healthy People 2010 Target 1.7/1000
Assessing our Needs -- 2009

Step 1: Checking our assumptions

First check = small retrospective sample
2\textsuperscript{nd}/3\textsuperscript{rd} Q 2008: all ICD9 asthma visits (n=96), 5 sites

- Almost no ER/Hosp utilization
- 10\% AAP ever (4 \% last year)
- 53\% asthma severity documented ever (10\% in FM w/o referral)
- 21-48\% Subspec referral rate (peds vs FM)
- Symptom questionnaire use \textit{none}
  \(\rightarrow\) would later find only 62\% of those asked were under control
- Education ???
- Would later find influenza vaccination status 60\%
Assessing our Needs

Step 2: Critical Self-Assessment (Where are we?)

- No registry
- “Soft” diagnosis
- Variable nursing involvement
- Variable pt education availability
- Information not pull-able
- Inconsistent documentation
- No “standard” of care (NAEPP/NHLBI)
- Minimal use of Asthma Action Plans
- Minimal (no?) support to school system
The core principle is the same: The needs of the **patient come first**. The way we define and address our patient’s needs is changing. We use a **team approach**, with all team members working to the **full extent of their licensure**. We assess and address our patient’s needs **beyond their chief complaint**. We address the needs of our patient population **whether they are seeing us in the office or not**. We work more closely to **coordinate care** with the ED, hospital, care facilities and community partners.

The **traditional paradigm we use to care for our patients is unsustainable**. We are responsible for ever increasing numbers of patients. Advances in medicine and public health have resulted in a much older and medically complex patient population. We are expected to effectively deliver a broad range of preventive and chronic care services to our patients ... **A physician does not have time, resources or energy during a face-to-face office visit to accomplish this work. A new approach is needed.**
Is it ethical to “tier” our patients?

Our goal is to provide the right care, at the right time, in the right location, with the right provider. In our traditional model, we frequently provide unnecessary care to our healthy patients, and inadequate care to our sickest patients.

We need to develop systems to remain engaged with those patients and respond to their needs in a timely fashion to the best of our ability. By tiering our patients, based on their medical and psychosocial complexity, we are able to design and apply systems of care to better meet their needs.
Assessing our Needs - Reality Check

- **Potential concerns:**
  - Potentially large impact ... estimated 3000 pts at our sites
  - Systems issues ... “Pullable” info system, searchable registry
  - Philosophical decisions
    - External quality metrics “not fair”
    - “Exceptionism”
    - Potential challenge to autonomy

- How do we (should we) align with healthcare home?
- Why should we consider change?
- Where do we start ??????
New Rules


- Registry – focus on all kids with asthma in our panels
- Agree to agree
  - “MDs prefer to practice alone together”
  - Evidenced based care
- Meet patient in a different way (nonvisit care)
  - Right Care, right time, right place
  - More longitudinal, less reactive
- Care team model ... asthma care manager
  - Less hierarchical, trust in others
  - Work to full level of licensure
- Need metrics for assessment
- “Cocoon of Support” = school system, family
New Rules – Addition of Care Coordinator

- **Guideline-based assessment**
  - Symptom assessment
  - Barrier assessment
  - Equipment needs

- **Education**
  - Disease process, lifestyle changes
  - Including people not present at visit

- **Administrative (now transitioning off to others)**
  - Forms, Refills, AAP completion

- **Later: Population Management**

*Also to provide some uniformity for the practice and “mini-experts”*
Addition of RN Care Coordinator

- Where do you start ????
### Site 1 (start Mar 2009)

<table>
<thead>
<tr>
<th></th>
<th>2\textsuperscript{nd}-3\textsuperscript{rd} Q’08</th>
<th>Goal (6 mo)</th>
</tr>
</thead>
<tbody>
<tr>
<td>(n=180)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Current AAP</td>
<td>2%</td>
<td>20%</td>
</tr>
<tr>
<td>Current Severity</td>
<td>41%</td>
<td>60%</td>
</tr>
</tbody>
</table>

(chart review on children with appts in primary care)
Start Small with Attainable Victories

Site 1 (start Mar 2009)

<table>
<thead>
<tr>
<th></th>
<th>2nd-3rd Q’08 (n=180)</th>
<th>Goal</th>
<th>2nd-3rd Q’09 (n=234)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Current AAP</td>
<td>2%</td>
<td>20%</td>
<td>48.1%</td>
</tr>
<tr>
<td>Current Severity</td>
<td>41%</td>
<td>60%</td>
<td>75.3%</td>
</tr>
</tbody>
</table>

(chart review on children with appts in primary care)
Start Small with Attainable Victories

Site 1 (start Mar 2009)

<table>
<thead>
<tr>
<th></th>
<th>2nd-3rd Q’08 (n=180)</th>
<th>Goal</th>
<th>2nd-3rd Q’09 (n=234)</th>
<th>2nd-3rd Q’10 (n=213)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Current AAP</td>
<td>2%</td>
<td>20%</td>
<td>48.1%</td>
<td>73.7%</td>
</tr>
<tr>
<td>Current Severity</td>
<td>41%</td>
<td>60%</td>
<td>75.3%</td>
<td>92.5%</td>
</tr>
</tbody>
</table>

(chart review on children with appts in primary care)
Pediatric Asthma Care Coordination

1) Changing landscape
2) Assessing current needs of our practice
3) Putting a structure into place
4) Aspects of Spread/Maintenance
Putting a Structure into Place

Looking back, what was important?
- Enrollment/Graduation Criteria
- Competencies
- Clarity re: RN “action”
- Medical Rule set (NAEPP/NHLBI Guidelines)
- Develop tools
  - Questionnaires
  - Database
- Communication with rest of care team
- Community (school) engagement
- Parent feedback
- Metrics

An iterative process with spirit of continual improvement
Structure: Enrollment

- **Enrollment Criteria**
  - Ages 5-18, current primary care patient
  - “Persistent” Asthma
  - Asthma not under Good Sx Control (Red, Yellow)
  - Active Health-care Utilizers (ER/Hosp)

- **Graduation:**  “Green” (well controlled) for a year
  - No maintenance med (this would later change)
  - No ER/Hosp use
  - Later: lack of patient engagement

CC is also a resource for general asthma questions

*Need IT tools … but process must be done first*
Structure: Competencies

- Triage/assessment
- Knowledge
- Documentation
- Pt Education
- Facilitator
- Communication

© 2011 Mayo Clinic
Structure: Medical Rule set (NAEPP/NHLBI) allows RNs to perform full assessment w/ recommendations
**Figure 16. Stepwise Approach for Managing Asthma in Youths ≥12 Years of Age and Adults**

**Intermittent Asthma**
- **Consult with asthma specialist if step 4 care or higher is required.**
- **Consider consultation at step 3.**

**Step 1**
- **Preferred:** Low-dose ICS or LABA
- **Alternative:** Cromolyn, LTRA, Nedocromil, or Theophylline

**Step 2**
- **Preferred:** Low-dose ICS + LABA
- **Alternative:** Medium-dose ICS + LABA
- **Consider** Omalizumab for patients who have allergies

**Step 3**
- **Preferred:** Medium-dose ICS + LABA
- **Alternative:** Medium-dose ICS + LTTRA, Theophylline, or Zileuton
- **Consider** Omalizumab for patients who have allergies

**Step 4**
- **Preferred:** High-dose ICS + LABA + Oral corticosteroid
- **AND**
- **Consider** Omalizumab for patients who have allergies

**Step 5**
- **Preferred:**
  - High-dose ICS + LABA + Oral corticosteroid

**Step 6**
- **Step up if needed**
  - (first, check adherence, environmental control, and comorbid conditions)
  - Assess control
  - Step down if possible
  - (and asthma is well controlled at least 3 months)

**Key:**
- Alphabetical order is used when more than one treatment option is listed within either preferred or alternative therapy. ICS, inhaled corticosteroid; LABA, long-acting inhaled β₂-agonist; LTRA, leukotriene receptor antagonist; SABA, inhaled short-acting β₂-agonist

**Notes:**
- The stepwise approach is meant to assist, not replace, the clinical decision-making required to meet individual patient needs.
- If alternative treatment is used and response is inadequate, discontinue it and use the preferred treatment before stepping up.
- Zileuton is a less desirable alternative due to limited studies as adjunctive therapy and the need to monitor liver function. Theophylline requires monitoring of serum concentration levels.
- In step 6, before oral corticosteroids are introduced, a trial of high-dose ICS + LABA + LTTRA, theophylline, or zileuton may be considered, although this approach has not been studied in clinical trials.
- Step 1, 2, and 3 preferred therapies are based on Evidence A; step 3 alternative therapy is based on Evidence A for LTTRA, Evidence B for theophylline, and Evidence D for zileuton. Step 4 preferred therapy is based on Evidence B, and alternative therapy is based on Evidence B for LTTRA and theophylline evidence and Evidence D zileuton. Step 5 preferred therapy is based on Evidence B. Step 6 preferred therapy is based on EPR—2 1997 and Evidence B for omalizumab.

**Quick-Relief Medication for All Patients**
- SABA as needed for symptoms. Intensity of treatment depends on severity of symptoms: up to 3 treatments at 20-minute intervals as needed. Short course of oral systemic corticosteroids may be needed.
- Use of SABA >2 days a week for symptom relief (not prevention of EIB) generally indicates inadequate control and the need to step up treatment.

**Immunotherapy for steps 2-4** is based on Evidence B for house-dust mites, animal danders, and pollen; evidence is weak or lacking for molds and cockroaches. Evidence is strongest for immunotherapy with single allergens. The role of allergy in asthma is greater in children than in adults.

Clinicians who administer immunotherapy or omalizumab should be prepared and equipped to identify and treat anaphylaxis that may occur.
**FIGURE 18. ESTIMATED COMPARATIVE DAILY DOSAGES FOR INHALED CORTICOSTEROIDS**

<table>
<thead>
<tr>
<th>Drug</th>
<th>Low Daily Dose</th>
<th>Medium Daily Dose</th>
<th>High Daily Dose</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Child 0–4 Years of Age</td>
<td>Child 5–11 Years of Age</td>
<td>≥12 Years of Age and Adults</td>
</tr>
<tr>
<td>Beclomethasone HFA 40 or 80 mcg/puff</td>
<td>NA</td>
<td>80–160 mcg</td>
<td>80–240 mcg</td>
</tr>
<tr>
<td>Budesonide DPI 90, 180, or 200 mcg/ inhalation</td>
<td>NA</td>
<td>180–400 mcg</td>
<td>180–600 mcg</td>
</tr>
<tr>
<td>Budesonide Inhaled Inhalation suspension for nebulization</td>
<td>0.25–0.5 mg</td>
<td>0.5 mg</td>
<td>NA</td>
</tr>
<tr>
<td>Flunisolide 250 mcg/puff</td>
<td>NA</td>
<td>500–750 mcg</td>
<td>500–1,000 mcg</td>
</tr>
<tr>
<td>Flunisolide HFA 80 mcg/puff</td>
<td>NA</td>
<td>160 mcg</td>
<td>320 mcg</td>
</tr>
<tr>
<td>DPI: 50, 100, or 250 mcg/inhalation</td>
<td>NA</td>
<td>100–200 mcg</td>
<td>100–300 mcg</td>
</tr>
<tr>
<td>Mometasone DPI 200 mcg/inhalation</td>
<td>NA</td>
<td>NA</td>
<td>200 mcg</td>
</tr>
<tr>
<td>Triamcinolone acetonide 75 mcg/puff</td>
<td>NA</td>
<td>300–600 mcg</td>
<td>300–750 mcg</td>
</tr>
</tbody>
</table>

Key: DPI, dry power inhaler; HFA, hydrofluorocalkane; MDI, metered-dose inhaler; NA, not available (either not approved, no data available, or safety and efficacy not established for this age group)
# Asthma Control Assessment Questionnaire

## Adolescent Asthma Control Assessment (Ages 12 and older)

This paper form is not part of the medical record. Discard after electronic entry.

<table>
<thead>
<tr>
<th>Mayo Clinic Number</th>
<th>Patient Name (First, Middle, Last)</th>
<th>Date Today (Month DD, YYYY)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

These questions will help you describe your teen’s asthma and how it is impacting their lives. It will help us determine how well controlled their asthma is. Please check ✓ in the box that best describes your answer.

### 1. During the last month, how many days did your teen have asthma symptoms? (such as wheezing, coughing, chest tightness, shortness of breath)

<table>
<thead>
<tr>
<th>Not at all</th>
<th>1-2 times a week</th>
<th>3-6 days a week</th>
<th>Once a day</th>
<th>Throughout the day</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
</tbody>
</table>

### 2. During the last month, how many times did asthma affect your teen’s sleep? (such as wheezing, coughing, chest tightness, shortness of breath)

<table>
<thead>
<tr>
<th>Not at all</th>
<th>1-2 times a month</th>
<th>3-4 times a month</th>
<th>2-3 nights a week</th>
<th>4 nights a week or more</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
</tbody>
</table>

### 3. During the last month, how much did asthma limit your teen’s normal activity? (such as running, playing, attending school)

<table>
<thead>
<tr>
<th>Not at all</th>
<th>Almost never</th>
<th>A little</th>
<th>Moderate</th>
<th>A lot</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
</tbody>
</table>

### 4. During the last month, how many times did they use a “rescue medicine” like Albuterol? (because of asthma symptoms such as wheezing, chest tightness, etc.)

<table>
<thead>
<tr>
<th>Not at all</th>
<th>1-2 times a week</th>
<th>3-4 times a week</th>
<th>Daily</th>
<th>Several times a day</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
</tbody>
</table>

### 5. During the last year, how many times did your teen need oral steroids for wheezing or asthma? (such as Prednisone, Prednisolone, Predone, Decamethasone, Decadron)

<table>
<thead>
<tr>
<th>Not at all</th>
<th>1 time this past year</th>
<th>2 times this past year</th>
<th>3 or more times this past year</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
</tbody>
</table>

## Determining level of asthma control

- **Green Zone**: If all of your answers were 0 or 1, your teen’s asthma is likely well controlled.
- **Yellow Zone**: If you have any answers of 2 or 3, your teen’s asthma is likely not well controlled.
- **Red Zone**: If you have any answers of 4, your teen’s asthma is likely under poor control.

If your teen is in the **Yellow Zone** or **Red Zone**, please talk with your health care provider.
How controlled has your child's asthma been over the last month?

☐ Completely  ☐ Well  ☐ Somewhat  ☐ Poorly  ☐ Not at All

How confident are you in your ability to care for your teen's asthma and knowing what to do when?

☐ Almost Always (>90%)  ☐ Most of the time (>75%)  ☐ Sometimes (50%)  ☐ Rarely (<25%)  ☐ Never (0%)

How often is your teen able to take their medications as prescribed?

☐ Almost Always (>90%)  ☐ Most of the time (>75%)  ☐ Sometimes (50%)  ☐ Rarely (<25%)  ☐ Never (0%)

Challenges for your family (example: cost/insurance coverage, remembering to take it, teen's cooperation, etc.):

______________________________________________________________

Do you have any concerns about possible side effects of your teen's asthma medications?  ☐ Yes  ☐ No

If so, what concerns?

______________________________________________________________

In the past 12 months:
How many times did your teen go to the Emergency Room for asthma or wheezing?  ☐ 0  ☐ 1  ☐ 2  ☐ 3  ☐ 4+

How many times was your teen hospitalized for asthma or wheezing?  ☐ 0  ☐ 1  ☐ 2  ☐ 3  ☐ 4+

In the past 12 months, how many days of school or work were missed due to asthma or breathing concerns?

☐ 0  ☐ 1  ☐ 2  ☐ 3  ☐ 4  ☐ 5  ☐ 6  ☐ 7  ☐ 8  ☐ 9  ☐ 10 or more

What is your teen's smoke exposure?  ☐ secondhand smoke exposure  ☐ teen smokes  ☐ teen used to smoke  ☐ none

Which of the following seem to trigger your teen's asthma flares?

☐ Yes  ☐ No  Allergy
☐ Yes  ☐ No  Sinusitis
☐ Yes  ☐ No  Acid reflux
☐ Yes  ☐ No  Respiratory Infection
☐ Yes  ☐ No  Exercise
☐ Yes  ☐ No  Weather
☐ Yes  ☐ No  Other

(explain)
Structure: Communication within the Care Team

Goals:
1) Develop processes
   ex: phone calls, electronic communication

2) Shift “spirit” of team work

Engage the whole team, including the “front line” with concrete processes
Structure ... Results of increased communication with Care Team (PDSA cycles)
RN Services Provided over First 700 Days at Baldwin3+NE+NW
(Over this time: 4592 Successful RN-Patient Communications for 622 Pts Accepted into Formal Care Management, 2515 Missed Phone Calls and 645 Letters Sent to Home)

<table>
<thead>
<tr>
<th>RN Services Provided</th>
<th>Number of Times</th>
</tr>
</thead>
<tbody>
<tr>
<td>Referral to subspecialist</td>
<td>20</td>
</tr>
<tr>
<td>Recommended RN Visit</td>
<td>63</td>
</tr>
<tr>
<td>Recommended MD/NP Visit</td>
<td>317</td>
</tr>
<tr>
<td>Provided PFTs</td>
<td>298</td>
</tr>
<tr>
<td>Provided Test Results</td>
<td>144</td>
</tr>
<tr>
<td>Completed Equipment</td>
<td>130</td>
</tr>
<tr>
<td>Completed Forms</td>
<td>176</td>
</tr>
<tr>
<td>Refilled Prescription</td>
<td>202</td>
</tr>
<tr>
<td>Provided Education</td>
<td>1384</td>
</tr>
<tr>
<td>Asthma Control Assessed</td>
<td>1318</td>
</tr>
<tr>
<td>Asthma Symptom Control Assessed</td>
<td>2177</td>
</tr>
<tr>
<td>Asthma Maintenance Med Changed</td>
<td>928</td>
</tr>
<tr>
<td>Barriers/Compliance/Triggers Assessed</td>
<td>314</td>
</tr>
</tbody>
</table>
Structure: Gather Metrics that you need for 719 days of experience (484 pts in CM)

<table>
<thead>
<tr>
<th>Category</th>
<th>Total (%)</th>
<th>Non visit</th>
<th>RN time</th>
<th>MD/NP involved</th>
</tr>
</thead>
<tbody>
<tr>
<td>Initial full asthma CM assess</td>
<td>484 (15.1%)</td>
<td>86%</td>
<td>35.7 min</td>
<td>73% (7.1 min, 5.2 min)</td>
</tr>
<tr>
<td>Partial Asthma Control assess</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Twice/year Full assessment</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Provider f/u visit</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>F/u re: med change, acute</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Education</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>3203</td>
<td></td>
<td>28.6 avg</td>
<td>3.4 min avg</td>
</tr>
</tbody>
</table>

Average 4.0 contacts/yr

For those in Care Management - 2011

1.8 hr/pt/year RN
13.6 min/pt/yr MD/PNP

This allows us to justify FTE needs and plan better over time, including need for blocked “nonvisit” time for MD/NPs

Also gives us focus for increased efficiency

© 2011 Mayo Clinic
1) Changing landscape
2) Assessing current needs of our practice
3) Putting a structure into place
4) Aspects of Spread/Maintenance
   o Start small...build on success
   o Measure what you need – to the level of detail needed
   o Keep it real
   o Change in culture occurs over time
Aspects of Spread/Maintenance
Aspects of Spread/Maintenance

If I could give you a hug over the phone, I would this is the first time I have felt like someone cares for my daughter.

The other day when picking him up school he was playing dodge ball and running with the other kids and was doing great, I thought “sweet”!!!!

Motivation …Keep it real
Principles of Co-management

• Subspec-Primary Care partnership (“collaborative care partnership”)

• Agreement on a standard of care
  ○ Evidenced-based, consensus-based when needed.
  ○ Subspecialty group lends medical expertise and higher level of experience with that chronic disease
  ○ Primary care lends Health Care Home and population expertise
  ○ Local tools: Hot buttons, point of care prompts, decision tree development, etc
Principles of Co-management

- Roles explicitly defined
  - Most appropriate use of each resource
  - Criteria for stepping up/down care to this resource
  - Logistical ?s: who should patient call with questions, for refills, etc
  - Local tools: Inclusion/exclusion criteria, Web-based info, guide buttons on Orders

- Registry
  - Who is in the population of focus (who is not)
  - How do you find them?
  - “Panel manager” to mine the registry for patient needs
Principles of Co-management

- Structured tool to communicate
  - Local Tools: Inbox messages, Visio diagrams, E-consults, patient portal
  - Ongoing communication b/w stakeholders

- Local champions embedded on each care team
  - Traits: “early adaptors” with strong clinical skills (high quality metrics, low subspec utilization), strong communicators
Principles of Co-management

- Leadership support ECH expectations
  - Elevator speech – this is the direction we are heading
  - Sense of Accountability
  - Transparency
    - Quality metrics visible to all
    - Local Tools:
      - Quality Dashboard (down to care team level)
      - Provider-specific data
Ultimate Goals

- Inc quality outcomes for our primary care patients with chronic disease via consistent evidenced-based “population management” practice

- Decrease cost of caring for these patients by
  - minimizing waste
  - focusing on “value added” aspects of care
  - ensuring that providers are working up to their level of licensure (care done by right person, right time, right place)
Ultimate Goals

- Ensure appropriate level of care is given to patient
- Ensure that access is available to higher levels of care when needed
- Ensure that pts have received the right initial management (including workup) while waiting to receive this higher level of care
- Strengthen the concept of the Health Care Home, including community and patient engagement
More Recently: “All or none” MNCM metrics for our entire population
Did we meet these goals

- Quality metrics improved
- Decreased cost
  - Decreased referral to subspec
  - Subspec willingness to ‘give back’ patients to Primary Care
  - More and More non-visit care
  - Eliminating waste
- Stronger community engagement (schools)
- Better alignment with ‘real world’ needs of the patient
Next Steps

- Subspecialist “handoff” of patients back to primary care (at primary care location)

- Community Health Worker pilot
  - Culturally-competent, single point of contact for family
    - Home visits: Environmental triggers, other barriers to wellness
    - Proper use of medications/strategies for managing disease
    - Enable access of local health resources
  - Goals: increase patient activation/empowerment and, ultimately, ability to self-manager
Lessons learned

- Check your assumptions
- Perfect is the enemy of good
- Sometimes it is good to have delays
- Understand everyone’s needs and motivations (win:win)
- Change and trust take time
• Extra info
Many individuals might endorse both of the following statements. Which statement better fits how you feel (n=99).
MD "comfortable with guidelines" score = 91%, NP = 89%,
Care Manager = 100%, hallway nurse = 84%

- 87%: I am comfortable with the concept of consensus. I feel that mandates by the state (or by my practice) for more consistency in adhering to "guidelines" is needed.
- 13%: I feel that autonomy and independent thinking are more important and generally disagree with the concept of "guideline"-based care.
More Recently (since end of 2011)
Ped Asthma Care Coordination
More Recently (since end of 2011)
Ped Asthma Care Coordination
More Recently (since end of 2011) Ped Asthma Care Coordination