Primary Care Obesity Network

Anne Goodman, MPH
Obesity Prevention Coordinator
Four Stages for Childhood Obesity Management

Stage 1
Prevention Plus
Primary care provider

Stage 2
Structured Weight Management
Primary care provider with appropriate training

Stage 3
Comprehensive Multidisciplinary Treatment
Lifestyle intervention (e.g., MEND, Healthy You & Your Child) offered in Pediatric Weight Management Center/Community Settings

Stage 4
Tertiary Care Interventions
Bariatrics, specialized diets, medication interventions offered in Pediatric Weight Management Center

Barlow SE; Expert Committee, 2007
The Primary Care Obesity Network: Translating Expert Committee Guidelines on Childhood Obesity Into Practice

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Abstract
Childhood obesity remains a serious public health threat. There is an urgent need for innovative, effective, and sustainable interventions for childhood obesity that are multisector, integrated, and pragmatic. Using the 2007 Expert Committee on the Assessment, Prevention, and Treatment of Child and Adolescent Overweight and Obesity as a guide, a tertiary care obesity program at a children’s hospital established the Primary Care Obesity Network (PCON). This article describes the structure, implementation, resources, and outcome measures of the PCON, a network of primary care practices and a tertiary care obesity center established to prevent and treat childhood obesity in Central Ohio. This program offers an opportunity to assess how and whether the expert committee guidelines can be translated into practice. As Accountable Care Organizations strive to provide services through the lens of improving population health, the PCON can serve as an example for addressing childhood obesity.

Keywords
primary care, children, obesity, integration, treatment

Childhood obesity can be optimally managed by concurrently tackling risk factors at several socioecological levels. Treatment within the primary care office offers an opportunity to reach and engage a larger proportion of
Primary Care Obesity Network (PCON) Objectives

• Implement high-quality, evidence-based obesity care by providing training, allied health, and administrative support for primary care practices.

• Create clinic-community linkages by establishing a patient-centered medical neighborhood that recognizes and supports the care of patients.
Structure & Implementation

PCON Team
- Director of CHWN
- Program dietitians
- Obesity Prevention Coordinator
- Two Physician Leads

Practice Champions
- Physician Lead
- Administrative Lead

Practice Staff
- Medical providers
- Nurses
- Allied Health
- Administrative
PCON Quick Facts:

- Children 2 and older
- BMI at or above 85th percentile
- Monthly visits:
  - Stage 1 – MD/NP
  - Stage 2 – plus RD
Healthy Weight Quick Facts

- Children 2 and older
- BMI at or above 95th percentile
- Monthly visits 1:1 Visits in clinic
  - Individualized treatment plan
  - Physician or NP
  - Dietitian
  - PT
  - SW/ Psychology*
- New U evening group programs- (child & parent )
  - ATC
  - Dietitian
  - +/- Psych
Bariatric Quick Facts

- Adolescents 13-26
- BMI at or above 40
- Monthly visits
  - Physician or NP
  - RD
  - PT
  - SW/ Psychology*
- Seen at least 6 to 9 months before surgery
- Specialized diets, (e.g., PSMF, low-CHO diets)
- Medications

Patient Centered Medical Neighborhoods
community organizations: parks, recreation centers, gyms, markets, schools, daycares, policy and leadership building

Center for Healthy Weight and Nutrition (CHWN)

Primary Care Obesity Network (PCON)

Stage 1
Primary care provider office

Stage 2
Primary care office with allied health provider (e.g., dietitian)

Stage 3
Intensive care with multidisciplinary team

Stage 4
Bariatric surgery, very low calorie diets, medications
**PCMN Quick Facts**

- Set of relationships around medical home
- Links individuals to pertinent resources in their own community
- Community organizations, parks, recreation centers, markets, schools, day cares, as well as policy and leadership building.

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**Center for Healthy Weight and Nutrition (CHWN)**

**Primary Care Obesity Network (PCON)**

- **Stage 1**: Primary care provider office
- **Stage 2**: Primary care office with allied health provider (e.g., dietitian)
- **Stage 3**: Intensive care with multidisciplinary team
- **Stage 4**: Bariatric surgery, very low calorie diets, medications

**Patient Centered Medical Neighborhoods**

Community organizations: parks, recreation centers, gyms, markets, schools, daycares, policy and leadership building.
Program Outcomes

<table>
<thead>
<tr>
<th>Outcomes</th>
<th>Variables</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program</td>
<td>Clinic utilization rate</td>
<td>75% of available clinic appointments are filled for each session</td>
</tr>
<tr>
<td></td>
<td>Uptake of community resources</td>
<td>Percentage of participants who use community resources</td>
</tr>
<tr>
<td>Provider</td>
<td>Participation in training</td>
<td>Practice champion will attend annual training</td>
</tr>
<tr>
<td></td>
<td>Participation in webinar</td>
<td>Attend 2 webinars a year</td>
</tr>
<tr>
<td>Patient</td>
<td>Anthropometrics: BMI, BMI z-score; diet</td>
<td>75% will have 3 or more visits in 6 months</td>
</tr>
<tr>
<td></td>
<td>and physical activity behaviors</td>
<td>55% of patients with 3 or more visits in 6 months decrease BMI</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Improvement in diet and physical activity behaviors after 3 PCON visits</td>
</tr>
</tbody>
</table>

Abbreviations: PCON, Primary Care Obesity Network; BMI, body mass index.

Eneli et al., 2017)
PCON Support

- Annual training: 2-3 hours
- Opportunity for Maintenance of Certification (MOC)
- Quarterly Webinars with CME
- Linkage to community activities
- Linkage to team of experts
- Social support
Training Content

• Medical
  – Review of program inclusion/exclusion criteria
  – Translation of expert committee guidelines into practice
  – Guidelines on screening and interpretation of lab results
  – Review potential co-morbidities

• Key messages & counseling techniques
  – Physical Activity
  – Nutrition

• Review motivational interviewing & AAP Institute of Healthy Childhood Weight Change Talk App

• Billing/coding guidelines

• Medical, nutrition, physical activity, and psychology case studies

• Prevention themes & local resources
Addressing obesity through linkages between families, community, healthcare and public health
The Patient Centered Medical Neighborhood: Link to local resources

- School
- Farmer’s market/community garden
- Grocery store
- Primary care office
- Workplace
- Fitness center

Image credit: Chris Taylor, PhD RD LD
Example Prevention Themes

Participation in Water First campaign.

Offered grocery store tours.

Distributing tomato plants during well visits.
Tip Sheets

Eat More Family Meals

Proper Portions

Fruits and Vegetables for Better Health

Eat a Healthy Breakfast Every Day

Limit Total Screen Time To 2 Hours A Day

Be Physically Active Daily

Limit Sugar-Sweetened Beverages

Why limit sugar-sweetened beverages?
• Sugar-sweetened beverages offer no nutrition but add a lot of extra calories and sugar
• Sugar-sweetened beverages often replace milk, which contains many nutrients for good health
• Sugar-sweetened beverages raise the risk of cavities and dental damage
• Sugar-sweetened beverages include: soda, lemonade, sweet tea, coffee drinks, juice, sports drinks, fruit punch
• Energy drinks contain sugar plus caffeine and other harmful ingredients. The American Academy of Pediatrics recommends no one under the age of 18 should consume these drinks.

Quick Tips
You can determine if your drink contains additional sugars by reading the ingredient list. Sweeteners listed on an ingredient list go by different names. The ingredients below show that a beverage is sweetened and will add extra calories.
• Corn Syrup
• High Fructose Corn Syrup
• Fructose
• Glucose
• Invert Sugar
• Cane Sugar
• Brown Sugar
• Sugar
• Sucrose
• Agave Syrup

Choose MyPlate.gov
My Plate Planner
A Healthy Meal Tastes Great

The plate method is a simple way to learn healthy portion sizes. Just split the plate into 3 parts, the largest part for vegetables.

Note to adults planning meals for smaller children: Remember to use a smaller plate or serve smaller portions if you don’t have different plate sizes.

6 oz. Fat-free or 1% milk

Your hand can help you measure the right amount of food to eat. Use your hand to measure portions.

Palm of Hand
Amount of Lean Meat

A Fist
Amount of Rice, Cooked Pasta, or Casserole

A Thumb
Amount of Cheese

Thumb Tip
Amount of Peanut Butter

Plate size for children

Plate size for teens and adults

7-inch plate (children)

7-inch plate (adult)

Nationwide Children’s
When your child needs a hospital, everything matters.
MyPlate Placemat - Back

How to Choose Healthy

Don't Eat This!
- White Bread
- White Rice
- Fried Fish Sticks
- Spareribs
- Sausage
- Double Cheeseburger
- Pepperoni Pizza

- Full of Sugar
- Low in Fiber
- Oily!
- Lots of Fat

Eat This!
- Green Beans
- Spinach
- Banana
- Apple
- Carrots
- Grilled Beef
- Baked Fish
- Low Fat Yogurt
- Low Fat or Natural Peanut Butter
- Cheese
- Egg
- Yams
- Corn
- Whole Wheat Veggie Pizza

- Full of Vitamins
- Helps You Grow
- 1/2 MyPlate
- Full of Fiber
- Calcium for Your Bones

Your hand can help you measure the right amount of food to eat.
- A Fist
  Amount of Fruits, Cooked Pasta or Cereal
- A Palm of Hand
  Amount of Lean Meat
- A Thumb
  Amount of Cheese
- A Thumb Tip
  Amount of Peanut Butter

Note: adult portion sizes for children; use your child's hand to measure portion sizes.

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Choose This, Not That

<table>
<thead>
<tr>
<th>Cereal</th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
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<tbody>
<tr>
<td>Fiber One</td>
<td>Cheerios</td>
<td>All-Bran</td>
<td>Jacks</td>
<td>Frosted Flakes</td>
<td>Toast Crunch</td>
<td>Cinnamon Toast Crunch</td>
<td>Kellogg's GO Lean Crisp!</td>
<td>Total</td>
<td>Krave</td>
</tr>
</tbody>
</table>

**Look For:**
- ≤ 6 g sugar
- ≥ 3 g fiber

**Topics**
- Cereal
- Fruit
- Bread
- Snacks
- Granola Bars
- Fast Food
- Beverages
- Breakfast
- School Snack
- Nutrition Labels
Think Your Drink - Front

Taking steps in the right direction: Think Your Drink

<table>
<thead>
<tr>
<th>Drink</th>
<th>Sugar in Cubes</th>
<th>Sugar in Grams</th>
</tr>
</thead>
<tbody>
<tr>
<td>Water</td>
<td>0 tsp</td>
<td>0 grams</td>
</tr>
<tr>
<td>8 oz Milk</td>
<td>8 tsp</td>
<td>12 grams</td>
</tr>
<tr>
<td>8 oz Diet Coke</td>
<td>10.25 tsp</td>
<td>20.5 grams</td>
</tr>
<tr>
<td>12 oz Pepsi</td>
<td>10.75 tsp</td>
<td>21.5 grams</td>
</tr>
<tr>
<td>12 oz Sunkist</td>
<td>8.75 tsp</td>
<td>16.5 grams</td>
</tr>
<tr>
<td>11 oz Capri Sun</td>
<td>8.25 tsp</td>
<td>17 grams</td>
</tr>
<tr>
<td>20 oz Gatorade</td>
<td>8.5 tsp</td>
<td>17 grams</td>
</tr>
</tbody>
</table>

*Reproduction of American Dairy Association's Think Your Drink Handout.
Think Your Drink - Back

AHA Guidelines for Added Sugar

- Preschoolers – 4 teaspoons (16 grams)
- 4-8 year olds – 3 teaspoons (12 grams)
- Preteens/Teens- 5-8 teaspoons (20-32 grams)
- Women – 6 teaspoons (24 grams)
- Men – 9 teaspoons (36 grams)

*Added sugar does not include natural sugar (e.g., sugar found in plain milk or fruits).

1 Teaspoon = 2 Sugar Cubes = 4 grams of sugar

*AHA stands for American Heart Association.
Community Resources List

• Maps
  – Local grocery stores
  – “Fresh Foods Here” corner store
  – Food pantries
  – Farmer’s Markets
  – Produce Markets

• Parks & Recreation Centers
• Relevant community centers
• Cooking Classes
• 5k’s
• Walk with a Doc
Contact Information

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