Contents

1) Outline for Presenters
   a. Talking points for the workshop
   b. Copy of the presentation notes that accompany the slides in the PowerPoint.

2) Handouts for Trainees

Keys to Success

☞ Work closely with the staff to adapt the workshops to their context and preferred approach
☞ For instance, framing the discussion in terms of “healthy habits for life” may be more appropriate than “obesity”
☞ Keep your workshop(s) interactive with lots of discussion
Work with Program schedules, but try to find uninterrupted
Overview
a. Obesity is increasing in America, especially among children.
b. Obesity is caused by many factors, some of which we can’t control, but many of which we can.
c. Childhood obesity puts these kids at an increased risk for health problems later in life.
d. Child care is an ideal setting to teach children healthy habits and combat childhood obesity.

1) Title: Childhood Obesity and Healthy Weight
a) Welcome and introductions. Possibly do a quick activity such as stretching or something to get the group interacted and ready to participate.
b) This is the first workshop in a series of workshops about preventing childhood overweight.
c) This workshop will introduce you to the issue of obesity and how it is affecting children at young ages, and how you can help. It will be followed by workshops on healthy eating and physical activity.

2) Objectives
a. Describe the problem of overweight in 2 to 5 year old children
b. List the possible consequences of being overweight as a young child.
c. Describe the role of the child care environment and of the child care staff in helping to prevent overweight in children.
d. List some ways in which your child care facility can help children eat healthier and get more activity

4) Measuring the Problem
How do we know what healthy weight is?

5) BMI for Age: Growth Chart
a) BMI is found on each side of this chart
b) Age is found along the bottom of the chart
CLICK to see an explanation of healthy weight, overweight and obesity
c) The green wave shows the range of BMI that would place a child from 2 years to 20 years of age in the healthy weight percentile
d) The yellow wave shows the range of BMI that would place a child from 2 years to 20 years of age in the overweight percentile.
e) The red wave shows the range of BMI that would place a child from 2 years to 20 years of age in the obese percentile.

6) Overweight Children in Michigan
a) The Pediatric Nutrition Surveillance System (PedNSS) is a surveillance system that monitors the nutritional status of low-income infants and children in federally funded maternal and child health programs (i.e. WIC).
b) This graphic shows the number of low-income children age 2-5 who are overweight throughout our state.
c) The darkly-shaded counties reflect higher rates of overweight among Michigan’s low-income infants and children.
d) With childhood poverty at 23% in Michigan and 28% or more in 20 out of 83, this is a good snapshot of how this problem is affecting our state.
7) Obese Children in Michigan

8) “Early Childhood Obesity Prevention” fact sheet
- Healthy Kids Healthy Michigan, a coalition dedicated to reducing childhood obesity in Michigan through strategic policy initiatives, developed the fact sheet that we made available to each of you today.
- The front-side illustrates some statistics and describes some of the health risks for obese and overweight children.
- The map of Michigan shows the percent of children aged 2 to <5 who are overweight or obese (2010).

9-12) Early Childhood Obesity Prevention Fact Sheet Scavenger Hunt
Find and call out statistics on obesity in early childhood
(HINT: there are 3 – CLICK to advance to the answers or jump to the desired slide when someone finds the right answer).
- Slide 11 (ANIMATED): “1 in 3 children...” (Bubble #1 from the top)
- Slide 12 (ANIMATED): Michigan statistic (Bubble #2 from the top)
- Slide 13 (ANIMATED): Chronic disease risk (Bubble #4 from the top)

13) Childhood Obesity and Chronic Disease
a) Children in this generation are dealing with adult health problems like:
   i) Abnormal Glucose tolerance/Type 2 Diabetes
   ii) High Blood Pressure
   iii) High blood fats – diagnosed in 70% of overweight children
b) These things all have something in common: These are serious health problems that can be prevented by eating healthy foods and staying active.

14) Childhood Obesity and Chronic Disease
Interesting facts:
There are racial disparities with these statistics with some children being more affected by Type 2 diabetes.
a) 3% of Hispanic Males and 40% of African America males born in 2000 are estimated to develop Type 2 diabetes.
b) 53% of Hispanic females and 49% of African American females born in 2000. These statistics alone are alarming.

15-16) Kids Born in the year 2000 are our 5th and 6th graders! (Interactive Slide)
Who are these kids born in the year 2000?
What is the size of the average 5th/6th grade classroom?
Have participants divide themselves up into three equal groups. CLICK

All of the kids (participants) in the FIRST group are estimated to develop Type 2 Diabetes in their lifetime.
- This is a serious problem since Type 2 diabetes is shown to shorten a lifespan by 11-14 years if diagnosed at age 40. We don’t have to accept this though. We can do something about it.

17) Obesity-Related Expenditure in Michigan (ANIMATED)
a) In 2008, medical costs for adult obesity estimated at $3.1 billion.
b) If adult obesity rates continue to rise, Michigan is estimated to spend $12.5 billion in health care costs for obesity in 2018. Source: American Health Rankings

18) Tying it all Together: Let’s Review (ANIMATED)
The data in the first bullet is data from Michigan DHS WIC program.

19) **Factors that affect obesity**
   a) **CLICK** Biology: genes
      i) There are factors that aren’t within our control.
      ii) Some people use food more efficiently and others are more prone to gain weight.
      iii) Some people have health conditions that restrict activity or require medications that cause changes in appetite or weight gain.
   b) **CLICK** Behaviors: diet and physical activity
      i) There are many more factors that we can control, including what we eat, how active we are and how we interact with each other around food.
      ii) As little as 100 calories per day can cause a person to gain weight. It is important to make sure you compensate with physical activity to create a balance between energy in and energy out.
   c) **CLICK** Environments: social and physical
      The environments where we live, learn, work and play either hinder or encourage healthy behaviors.

21) **Dietary Guidelines for Americans 2010**
    What can Americans do better to maintain healthy weight?

22) **Brainstorm (Interactive Slide)**
    Experts link eating nutritious food, engaging in daily age-appropriate physical activities, and limited screen time to maintaining a healthy weight in children. *Source: CFOC “Preventing Childhood Obesity in Early Care and Education Programs”* ([http://nrckids.org/SPINOFF/PCO/PreventingChildhoodObesity2nd.pdf](http://nrckids.org/SPINOFF/PCO/PreventingChildhoodObesity2nd.pdf))

24) **The Food Environment**
    Healthy Food and Beverages are nutrient rich (See list for examples)

25) **MyPlate**
   a) Food availability is the key element to a healthy food environment.
   b) People eat what is most accessible.
   c) A healthy food environment:
      • Makes clean drinking water accessible
      • Offers low fat dairy
      • Includes good quality fruit and vegetables
      • Healthier choices, like fruits and vegetables, are attractive and competitively priced compared to foods and drinks that are packed with added sugar, solid fat, and sodium
27-29) Early Childhood Obesity Prevention Fact Sheet Scavenger Hunt
Find and call out a fact and a strategy related to improving healthy eating.
HINTS
- “healthy beverages”
- The FRONT-SIDE illustrates some statistics and describes some of the health risks for obese and overweight children. On the BACK-SIDE of your fact sheet, you will see “how” to make changes.
- Slides 30-31 are ANIMATED

30) Move More
Another major factor that makes it harder to be healthy is a lack of opportunities, lack of safe options and supports for active lifestyles.

What is Physical Activity?

33-37) Early Childhood Obesity Prevention Fact Sheet Scavenger Hunt
Find and call out a fact and a strategy related to improving physical activity
HINTS:
- The FRONT-SIDE illustrates some statistics and describes some of the health risks for obese and overweight children. On the BACK-SIDE of your fact sheet, you will see “how” to make changes.
- There are TWO answers - CLICK to advance to the answers or jump to the desired slide when a participant finds the right answer).
Slide 37 and 38: Physical Activity
Slide 39 and 40: Screen Time

38) Tying it all Together: Let’s Review (ANIMATED)
NOTE: EACH TIME A “LET’S REVIEW” SLIDE APPEARS IT WILL ADD BULLETS TO BUILD UPON WHAT WE HAVE LEARNED

40) The Obesity Prevention Champion
NO BRAINER!!!
Child care providers are advocates for healthy children!!!

42) WIIFM?
a) Is anyone familiar with this acronym? “What’s in it for Me?”
b) Don’t be embarrassed if you are asking yourself this question. Child care is your business and your passion, and you are OBLIGATED to weigh cost and benefit when you are considering making changes.
c) A commitment to serve healthier foods and promote physical activity at every age is a win-win situation for your agency, your facility, your staff and the families and children you serve.

43) YOU CAN BE A CHAMPION FOR HEALTHY CHOICES
a) You’re on the front lines — from infancy on up.
b) You have a powerful opportunity to instill healthy habits and make positive lifestyle changes in kids right now — as their bodies and brains are growing and before they start developing unhealthy food preferences and habits that are hard to break.
c) Policies are marketing tools – they illustrate to families your commitment to the well-being of the children in your care.
44) YOU CAN BE A ROLE MODEL
   a) When children see the grown-ups in their lives eating healthy and being active — and enjoying it — they’re far more likely to do the same.
   b) When you serve nutritious foods and make physical activity a top priority at every age and stage, chances are, the kids will start asking for the same wholesome foods and fun activities at home.
   c) You might find that these changes are just as good for you, too!

45) YOU CAN BE A PARTNER IN PARENTING
   a) When moms and dads drop off their children, they know you’re helping their little ones’ brains and bodies grow up healthy.
   b) You can work together as a team to promote the importance of healthy lifestyles in their children’s early development.
   c) You’re helping to raise them and keep them safe, happy, and healthy just like their parents do at home.

46) IT’S EASIER THAN YOU THINK
   Serving healthy foods and beverages and incorporating physical activity into kids’ regular schedules often just means finding and using creative ways to feed kids and let them move their growing little bodies — inside and outside.

47) Tying it all Together: Let’s Review (ANIMATED)
NOTE: EACH TIME A “LET’S REVIEW” SLIDE APPEARS IT WILL ADD BULLETS TO BUILD UPON WHAT WE HAVE LEARNED
Some experts warn that this is the first generation that will have a shorter life expectancy than their parents.

Institute of Medicine

WORKSHOP OBJECTIVES

• Describe the problem of obesity in 2 to 5 year old children.

• List the possible consequences of being obese as a young child.

• Describe the role of the child care environment and of child care staff in helping to prevent obesity in children.

• List some ways in which their child care facility can help children eat healthier and get more activity.
Measuring the Problem

- Body Mass Index (BMI) is used as a screening tool to identify possible weight problems for children.
- A child’s BMI is calculated from their height and weight measurements, just like adults.
- This number is then plotted on a growth chart based on the child’s age and sex to determine their BMI percentile.
Obesity and Chronic Disease

**Pulmonary**
- Exercise Intolerance
- Sleep Apnea
- Asthma

**Gastrointestinal**
- Gallstones
- Gastro-esophageal Reflux
- Liver Disease

**Renal**
- Glomerulosclerosis

**Musculoskeletal**
- Slipped Capital Femoral Epiphysis
- Tibia vara (Knock knees)
- Flat Feet

**Neurological**
- Pulmonary Embolism

**Cardiovascular**
- High Blood Pressure
- High Cholesterol
- Chronic Inflammation

**Endocrine**
- Insulin Resistance
- Impaired Glucose Tolerance
- Diabetes Type 2
- Precocious Puberty
- Polycystic Ovarian Syndrome

**Psychosocial**
- Poor self-esteem
- Depression
- Stigmatization

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Prevalence of Obesity
Among children aged 2 to <5 years, by county

* 95th percentile BMI for age, CDC Growth Charts, 2000.
* 3% of children are expected to fall above the 95th percentile.

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Healthy Kids, Healthy Michigan
Every Childhood Disability Prevention
Health risks now and later for obese and overweight children

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X
X
X
X
X
X
X

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Pulmonary
Exertional Hypertension
Sleep Apnea
Asthma

Gastrointestinal
Gallstones
Gastro-esophageal Reflux
Liver Disease

Renal
Glomerulosclerosis

Musculoskeletal
Slipped Capital Femoral Epiphysis
Tibia vara (Knock knees)
Flat Feet

Neurological
Pulmonary Embolism

Cardiovascular
High Blood Pressure
High Cholesterol
Chronic Inflammation

Endocrine
Insulin Resistance
Impaired Glucose Tolerance
Diabetes Type 2
Precocious Puberty
Polycystic Ovarian Syndrome

Psychosocial
Poor self-esteem
Depression
Stigmatization
Obesity and Chronic Disease

Let’s think about the numbers and stats and try to make them real:
1 in 3 children born in 2000 will develop Type 2 Diabetes in their lifetime.
So who are these kids born in 2000?

Welcome to Fifth Grade

Obesity-Related Expenditure in Michigan

- 2008: $3.1 billion
- 2012: $12.5 billion

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Let’s Review...

• In Michigan, about 1 in 3 low-income children ages 2-5 years are overweight or obese.
• Overweight and obesity have long term physical and mental health consequences.
• Michigan children are in crisis.

What Factors Affect Obesity?

Our Genes...Not the BLUE ones!

What we do or don’t do related to health

Where we live, learn, work and play

Let’s Focus on What WE Can Change
“Eating and physical activity patterns that are focused on consuming fewer calories, making informed food choices, and being physically active can help people attain and maintain a healthy weight, reduce their risk of chronic disease, and promote overall health.”

Brainstorm

What factors in the environment make it harder for us to eat smart and move more?

Eating Smart: What are Healthy Food and Beverages?
The Food Environment

Healthy Food and Beverages are nutrient rich:

- Colorful Fruits and Vegetables
- Whole Grains
- Low-fat Dairy
- Beans and Legumes
- Nuts
- Lean meats

The Food Environment

When kids miss out on key food groups from nourishing meals with appropriate amounts of calories, they are deprived of essential nutrients they need for optimal learning.
Physical Activity is any body movement that works your muscles and requires more energy than resting.
Physical Activity in Early Childhood

• Physical activity and movement are an essential part of the development, learning, and growth of young children.

• Physical activity is also a crucial part of maintaining a healthy weight and preventing obesity.

Let’s Review...

• In Michigan, about 1 in 3 low-income children ages 2-5 years are overweight or obese.
• Being overweight is a risk to physical and mental health.
• Michigan children are in crisis.
• Poor nutrition and physical inactivity contribute to weight gain.
• Healthy lifestyle behaviors are formed early in life.
What Does All of This Mean for Child Care Providers?

“For many children, child care serves as a home-away-from-home and has the potential to positively influence their health.”

University of North Carolina
YOU CAN BE A ROLE MODEL

YOU CAN BE A CHAMPION FOR HEALTHY CHOICES

WIIFM?
YOU CAN BE A PARTNER IN PARENTING

IT’S EASIER THAN YOU THINK

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Let’s Review...

- In Michigan, about 1 in 3 low-income children ages 2-5 years are overweight or obese.
- Being overweight is a risk to physical and mental health.
- Michigan children are in crisis.
- Poor nutrition and physical inactivity contribute to weight gain.
- Healthy lifestyle behaviors are formed early in life.
- Child care providers play an important role in keeping children healthy and forming healthy lifestyle habits.
Healthy Kids, Healthy Michigan

Early Childhood Obesity Prevention
Health Risks Now and Later for Obese and Overweight Children

1 in 3 children are obese or overweight before their 5th birthday².

In Michigan, among low-income children ages 2-5 years, an average of 16.3% were overweight and 13.3% were obese³.

Some experts warn that this is the first generation that will have a shorter life expectancy than their parents⁴.

Obese children are more likely to have high blood pressure, high cholesterol, and type 2 diabetes, which are risk factors for cardiovascular disease. Obese children are more likely to become obese adults⁵.

Research states that infant and toddler T.V. exposure was associated with obesity, language delay, inactivity, aggression and decreased attention span⁶.

Studies have concluded that preschool-aged children spend very little time in vigorous physical activity and the majority of their time is spent in inactivity⁷.

Simply replacing 6oz of “juice drinks” with water daily could potentially prevent 11 lbs of excess weight gain over the course of a year⁸.

Percent of Children Who are Overweight* or Obese**
Aged 2 to <5, by County, Michigan, 2010¹.

*Overweight: >85th-95th percentile BMI-for-age
**Obese: ≥95th percentile BMI-for-age

Advocates for Healthy Weight in Children

www.healthykidshealthymich.com
Healthy Kids, Healthy Michigan

Early Childhood Obesity Prevention

Early learning and care settings, including both child care centers and informal care, present tremendous opportunities to prevent obesity by making an impact at a pivotal phase in children’s lives. Nationally, over 62% of preschoolers with working mothers are in some form of child care, with those aged 3-6 spending an average of 24.8 hours per week in childcare centers. Michigan has approximately 4,470 licensed childcare centers with a capacity of 294,362 children.

Michigan is working to change policies in licensed child care centers to reduce childhood obesity in preschoolers.

Increasing required daily physical activity to a minimum of 60 minutes per day through:
- Teacher-lead activities
- Free, active play
- Requiring annual physical activity education for child care providers

Limiting television, video and computer time.
- To a maximum of 60 minutes a day for children 2 and older

References
8. Calculation: Boz juice drink=140 kcal; 6oz juice drink=105 kcal. 105 kcal x 356 days/year = 38,325 kcal/year. 38,325 kcal/year/5,000 kcal/lb = 7.66 lbs/year.