

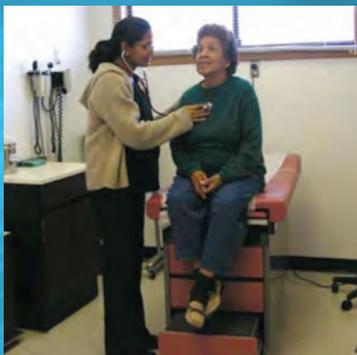


A Vision for Healthy Weight Across the Lifespan of American Indians and Alaska Natives

Actions for Health Care Teams and Leaders

Indian Health Service

2011







A Vision for Healthy Weight Across the Lifespan of American Indians and Alaska Natives

## Actions for Health Care Teams and Leaders

### Indian Health Service

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*Top row:* Prenatal care, IHS facility  
*Second row, from left:* IHS health care team; Postpartum care, IHS facility  
*Third row, from left:* Patient exam, Santa Fe IHS Hospital; Health care team, Wewoka Service Unit; Community nutrition lesson, Ohkay Owingeh Pueblo





**Indian Health Service**  
Office of Clinical and Preventive Services  
Division of Diabetes Treatment and Prevention  
Division of Clinical and Community Services

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**Sources of Copies**

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## Foreword



Now is the time to put our minds and resources together to beat the epidemic of obesity. With “Healthy Weight for Life: A Vision for Healthy Weight Across the Lifespan of American Indians and Alaska Natives” as a guide, we can make a difference.

American Indians and Alaska Natives nationwide are concerned that the obesity epidemic is affecting the well-being of our communities. Increases in weight have been associated with increased rates of type 2 diabetes, high blood pressure, high cholesterol, heart disease, stroke, cancer, asthma, and other pulmonary diseases, as well as orthopedic and psychological issues.

Tribal governments, communities, Tribal members, urban Indian organizations, and the Indian Health Service already have partnered together to promote lifestyle choices for reaching a healthy weight through hundreds of innovative and creative programs and activities. What do all these programs have in common? They are all based on research that shows:

- » **A healthy weight means healthier American Indians and Alaska Natives across the lifespan.**
- » **Ensuring a healthy weight means intervening early—even before conception.**
- » **A healthy weight is best achieved through lifestyle balance—in other words, balancing the energy (food and beverages) we take in with the energy we expend (physical activity).**
- » **Research shows that adults who are overweight only need to lose 5 percent to 10 percent of their body weight by eating less and moving more—that’s 10 to 20 pounds in a 200-pound person—to reduce the risk of developing diabetes. Weight loss also helps control diabetes and cardiovascular disease.**

Promoting healthy weight is not just a priority for the Indian health system. President Obama has established a Task Force on Childhood Obesity to develop a national interagency action plan to solve the problem of obesity within a generation. First Lady Michelle Obama has launched Let’s Move!, a national awareness campaign. Surgeon General Dr. Regina Benjamin has released a “Vision for a Healthy and Fit Nation” that outlines interventions to prevent obesity at every level of society.

“Healthy Weight for Life: A Vision for Healthy Weight Across the Lifespan of American Indians and Alaska Natives, Actions for Health Care Team Members and Leaders” provides Native Americans with guidance for taking action. Health care teams and leaders have a role to play. Select the actions best suited to your program and draw on the Resources on pages 18–30. Also, refer to the companion booklet, “Healthy Weight for Life: A Vision for Healthy Weight Across the Lifespan of American Indians and Alaska Natives, Actions for Communities, Individuals, and Families,” for additional information.

Working together, we can make a difference in ensuring the health and well-being of American Indians and Alaska Natives—now and for future generations.

Yvette Roubideaux, M.D., M.P.H.  
Director, Indian Health Service



## Executive Summary

Promoting a healthy weight across the lifespan is critical to improving the health status and well-being of American Indians and Alaska Natives (AI/AN), to reducing health disparities, and to maximizing the limited resources of the Indian health system. Taking action now has the potential to help achieve the Indian Health Service's mission of raising the physical, mental, social, and spiritual health of AI/AN to the highest level.

Across the country, hundreds of thousands of AI/AN participate in innovative nutrition, physical activity, and weight loss programs. Communities have conducted assessments and designed culturally sensitive programs to meet their particular needs. While progress has been made on certain measures, disparities still remain. Overweight and obesity continue to drive the high rates of type 2 diabetes, heart disease, stroke, pulmonary disease, many cancers, as well as orthopedic, oral health, and psychological problems.

### Trends and Impact of Obesity and Overweight

The prevalence of obesity in AI/AN and the U.S. population at large has increased dramatically over the past 30 years. According to the IHS Clinical Reporting System, over 80 percent of AI/AN adults ages 20 to 74 are overweight or obese; among children and youth, between 45 percent and 51 percent are not at a healthy weight.

The most recent estimate puts the cost of obesity-related *medical spending alone* in the United States at \$147 billion per year in 2008, compared with \$78.5 billion in 1998. This accounts for almost 10 percent of all medical spending.

### What Is a Healthy Weight?

For adults, a normal or healthy weight is defined as an appropriate weight in relation to height. This ratio of weight to height is known as the body mass index (BMI). BMIs for youth 2–20 years old are determined by comparing their weight and height against growth charts that take their age and gender into account.

Maintaining a healthy weight requires keeping an energy (or calorie) balance. Energy balance means balancing the calories people get from foods and beverages (ENERGY IN) with the calories people use to keep their bodies going and for being physically active (ENERGY OUT).

### Promoting Healthy Weight Across the Lifespan

The best approach to promoting healthy weight is a strategy that begins with conception and includes interventions throughout the lifespan to promote lifelong healthful eating and regular physical activity. This means protecting the fetus and newborn, infants and toddlers, children and adolescents, and adults and elders.

### **We All Have a Role to Play**

Given the multitude of factors that contribute to obesity and overweight, there is no one single approach that will work to turn the problem around. That is why individuals, families, schools, worksites, communities, the health care system, Tribal leaders and Tribal organizations, and society all have a role to play.

### **Actions for Society**

Society is made up of communities, organizations, families, and individuals—all working together for change. Healthful nutrition and physical activity legislation, statewide school policies, media campaigns, promoting healthy weight as a cultural, societal norm, and partnerships with Tribes are just some of the ways a comprehensive strategy to promote healthy weight across the lifespan takes shape on a large scale.

### **Actions for Communities**

Community organizations include the health care system, Tribes and Tribal organizations, schools, and worksites. By making changes in organizational policies and environments, these organizations can help individuals make better choices about healthful eating and physical activity.

### **Actions for Health Care Teams and Leaders**

Treating obesity and overweight is essential for preventing and treating diabetes, cardiovascular disease, and many other chronic conditions that take a major toll on the lives of AI/AN. The Indian health care system has the potential to play a major role in helping patients achieve and maintain a healthy weight across the lifespan by: adopting universal BMI screening, assessment, and intervention; adopting physical activity screening and encouraging patients to participate in physical activity; developing and fostering a breastfeeding-friendly culture policy; implementing comprehensive food standards policies for promoting healthy weight; and delivering quality health care. Health care team members can take action to influence patients' dietary choices and physical activity behaviors by implementing universal nutrition and physical activity education. They also can collaborate with schools, community groups, and worksites to help educate and reinforce healthy lifestyle behaviors and advocate for health care policy changes.

### **Actions for Individuals and Families**

Close interpersonal groups, such as families and friends, play an important role in encouraging more healthful behaviors and giving individuals the knowledge and support they need to make healthful eating and physical activity choices. Family mentoring can help pass on healthy habits to children. Intergenerational activities can help connect individuals and family members, and empowering elders can help facilitate change. Strengthening the individual culturally, spiritually, physically, and emotionally helps him or her live Life in Balance and to adopt healthful eating and physical activity behaviors.

### Choose the Action Steps Best Suited for You

“Healthy Weight for Life: A Comprehensive Strategy Across the Lifespan of American Indians and Alaska Natives, Actions for Health Care Teams and Leaders” provides guidance for taking action to stop the obesity epidemic. It is up to you to choose the role you want to play. Use the actions laid out in this booklet to chart your journey, and draw on the resources on pages 18–30 to help. Also, see the companion booklet, “Healthy Weight for Life: A Comprehensive Strategy Across the Lifespan of American Indians and Alaska Natives, Actions for Communities, Individuals, and Families.”

- » As a health care team member, you can begin by assessing every patient’s BMI; if the BMI is out of range, you can intervene based on current clinical guidelines and best practices to help your patient achieve a healthy weight.
- » As an IHS executive staff member at a local facility, you can incorporate healthy weight actions into your local services, programs, and activities.
- » As IHS senior leadership, you can set direction, establish policies, and promote accountability in your healthy weight programs and activities.

Remember that everyone has a role to play no matter how large or small. Working together, we can make a difference in achieving a healthy weight across the lifespan of American Indians and Alaska Natives—now and for future generations.



## Introduction: Laying Out the Vision

Promoting a healthy weight across the lifespan is critical to improving the health status and well-being of American Indians and Alaska Natives (AI/AN), to reducing health disparities, and to maximizing the limited resources of the Indian health system. Taking action now has the potential to play a major role in achieving the Indian Health Service’s mission of raising the physical, mental, social, and spiritual health of AI/AN to the highest level.

Across the country, hundreds of thousands of AI/AN participate in innovative nutrition, physical activity, and weight loss programs. Communities have conducted assessments and designed culturally sensitive programs to meet their particular needs. While progress has been made on certain measures, disparities still remain. Overweight and obesity continue to drive the high rates of type 2 diabetes, heart disease, stroke, pulmonary disease, and many cancers, as well as orthopedic, oral health, and psychological problems.

### Trends and Impact of Obesity and Overweight

The prevalence of obesity in AI/AN and the U.S. population at large has increased dramatically over the past 30 years. According to the IHS Clinical Reporting System, over 80 percent of AI/AN adults ages 20 to 74 are overweight or obese; among children and youth, between 45 percent and 51 percent are not at a healthy weight. See Table 1.

**Table 1. Prevalence of Overweight and Obesity in IHS Active Clinical Patients**

<b>Adults (ages 20–74):</b>
81 percent are overweight or obese 54 percent are obese 85 percent of adults ages 45–54 are overweight or obese (highest percentage of adult patients)
<b>Children and Youth (ages 2–19):</b>
45 percent of children ages 2–5 are overweight or obese 25 percent of children ages 2–5 are obese 49 percent of children ages 6–11 are overweight or obese 31 percent of children ages 6–11 are obese 51 percent of youth ages 12–19 are overweight or obese 31 percent of youth ages 12–19 are obese
<b>Source:</b> Unpublished fiscal year 2008 data from the IHS Clinical Reporting System (CRS) (2009 update coming) In FY 2008, the Government Performance and Results Act (GPRA) user population was 1,256,963. The active clinical population ages 2–74 was 837,545; this included 520,986 adults ages 20–74 and 316,559 youth ages 2–19. In FY 2008, 618,310 active clinical patients were screened for body mass index; this included 429,809 adults ages 20–74 and 188,501 youth ages 2–19. See the definition of overweight and obesity in adults and children and youth on the following page.



Six Nations Territory Unity Run

A recent analysis of CDC data on low-income, preschool-age children participating in federally funded health and nutrition programs showed that from 2003 through 2008 the rate of obesity remained stable among all groups except American Indian and Alaska Native children. In 2008, prevalence of obesity was highest among AI/AN (21.2 percent) and Hispanic (18.5 percent) children. Prevalence was lowest among non-Hispanic black (11.8 percent), Asian American and Pacific Islander (12.3 percent) and non-Hispanic white (12.6 percent) children. (Morbidity and Mortality Weekly Report, July 24, 2009, Vol. 58 (28), pp. 769–773)

The financial and societal impact of obesity is enormous. In 2000, the Centers for Disease Control and Prevention (CDC) estimated the *total* annual cost of obesity in the United States was \$117 billion for medical spending *and* the value of wages lost by employees unable to work because of illness, disability, or premature death. (This estimate is for the United States; a comparable figure for the Indian health system is not available.)

The most recent estimate puts the cost of obesity-related *medical spending alone* at \$147 billion per year in 2008, compared with \$78.5 billion in 1998, and accounts for almost 10 percent of all medical spending in the United States (Health Affairs, September/October 2009, Vol. 28 (5), pp. 822–831). Given the rapidly increasing rates of overweight, obesity, and diabetes in the general population and in AI/AN, the future costs of weight-related health care could be staggering.

In addressing the many complex factors that have contributed to the obesity epidemic, it is essential to recognize the principle of “behavioral justice.” While individuals are responsible for engaging in health-promoting behaviors such as healthful eating and getting regular physical activity, they should be held accountable *only* when they have adequate resources to do so. It is society’s responsibility to provide health-promoting environments that enable individuals to control and be accountable for their behaviors. As noted by Adler and Stewart in a recent issue of the Milbank Quarterly, we need to “[reframe] the discussion as one of justice rather than blame.” (Milbank Quarterly, March 2009, Vol. 87 (1), pp. 49–70)

### What Is a Healthy Weight?

For adults, a normal or healthy weight is defined as an appropriate weight in relation to height. This ratio of weight to height is known as the body mass index (BMI). People who are overweight have too much body weight for their height; people who are obese have a large amount of extra body fat in relation to their height. BMI for adults falls into the following categories:

Weight Status	BMI
Underweight	<18.5
Normal, or healthy weight	18.5–24.9
Overweight	25.0–29.9
Obese	30.0 and above

For children and teens, overweight is defined differently than it is for adults. BMIs for youth 2–20 years old are determined by comparing their weight and height against growth charts that take their age and gender into account, because children are still growing, and boys and girls develop at different rates. A child’s “BMI-for-age,” as it is called, shows how his or her BMI compares with other girls or boys of the same age. A child or teen between the 85th and 95th percentile on the growth chart is considered overweight. A child or teen at the 95th percentile or above is considered obese.

### Energy Balance: The Key to Maintaining a Healthy Weight

A person’s weight is the result of many factors working together: height, genes, metabolism, behavior, life stresses, and environment. Maintaining a healthy weight requires keeping an energy (or calorie) balance. Energy balance means balancing the calories people get from foods and beverages (ENERGY IN) with the calories people use to keep their bodies going and for being physically active (ENERGY OUT).

- » The same amount of ENERGY IN and ENERGY OUT over time = weight stays the same
- » More ENERGY IN than OUT over time = weight gain
- » More ENERGY OUT than IN over time = weight loss

ENERGY IN and OUT do not have to balance exactly every day. It is the balance over time that helps to maintain a healthy weight in the long run. For many people, the key to energy balance is eating fewer calories and increasing their physical activity.

### Promoting Healthy Weight Across the Lifespan

The best approach to promoting healthy weight is to develop a strategy that begins with conception of the fetus and includes interventions throughout the lifespan to promote lifelong healthful eating and regular physical activity. See Table 2.

**Table 2. Promoting Healthy Weight Across the Lifespan**

Fetuses & Newborns	Infants & Toddlers	Children & Adolescents	Adults & Elders
Promoting healthy weight at conception and during pregnancy	Promoting breastfeeding	Promoting healthful eating habits	Promoting healthful eating by modeling behaviors
Promoting diabetes (blood glucose) control before and during pregnancy	Promoting timely introduction of healthy solid foods	Limiting fast food, takeout food, and eating out	Decreasing portion size
Preventing low birth weight	Decreasing sweetened beverage consumption	Promoting regular physical activity	Limiting fast food, takeout food, and eating out
Preventing high birth weight	Limiting fast food, takeout food, and eating out	Decreasing sweetened beverage consumption	Increasing physical activity
Promoting breastfeeding	Encouraging 30 to 60 minutes of structured play and physical activity daily	Decreasing TV viewing and other screen time	Decreasing TV viewing and other screen time
	Decreasing TV viewing and other screen time		Promoting healthy weight maintenance

Adapted from: The Permanente Journal, Summer 2003, Vol. 7 (3): 9–10.

**Protecting Fetuses (Unborn) and Newborns**



Indian health facility newborn

Since the risk for obesity begins as early as the perinatal period, taking action while the baby is in utero (in the womb) is essential. This means women must plan their pregnancies and prepare for them by starting off at a healthy weight. Women with diabetes must be in good glycemic (blood glucose) control before they conceive and throughout their pregnancy. The possibility of the pregnant mother’s food insecurity must be addressed to ensure healthy weight gain. These strategies, plus smoking cessation, can help to prevent low birth weight and high birth weight, key risk factors for obesity later on.

**Protecting Infants and Toddlers**



Sisseton-Wahpeton Oyate infant

Numerous studies appear to show a positive association between breastfeeding and lower rates of overweight among children. The protective effect appears to persist into older childhood. Research also indicates that the longer children have been breastfed, the less likely they are to become overweight. It is recommended that women breastfeed exclusively during the first 6 months and continue

breastfeeding for at least 12 months. Breastfeeding needs to be followed by timely introduction of healthy solid foods in appropriate quantities. Infants and toddlers should get at least 30 to 60 minutes of physical activity to help develop motor skills and coordination.

### Protecting Children and Adolescents



Sechelt (British Columbia) adolescents

Three behavioral factors commonly associated with overweight among children are: long hours of television viewing and other screen time, consuming sweetened drinks (such as sodas), and consuming fast food. The role of parents and caregivers is particularly important in helping children establish a lifestyle that includes healthful eating habits and regular physical activity. Parents need to encourage children to follow the “5-2-1-0” model to ensure a healthy weight:



- » **5:** Eat 5 or more servings of fruits and vegetables each day.
- » **2:** Limit TV and other screen time to no more than 2 hours a day.
- » **1:** Engage in 1 hour of physical activity per day.
- » **0:** Limit sugar-sweetened beverages each day—none is best.

Weight bias may marginalize children and youth who are considered to be obese by other youth and teachers and may place them at risk for teasing and bullying. Efforts need to address this bias and the impact of teasing and bullying on the mental health of children and youth. Weight-related stigma and obesity have been found to co-occur with depression, low self-esteem, and suicidal thought.



White Mountain Apache elder

### Protecting Adults and Elders

Research shows it is much easier to maintain a healthy weight than it is to lose weight later on. To maintain body weight in a healthy range, adults must continue to balance calories from foods and beverages with calories expended. Adults need to decrease food and beverage calories and increase physical activity to prevent gradual weight gain over time. For elders, it is important to maintain weight by balancing nutrition and physical activity to avoid excessive weight loss. Most importantly, research continues to show that modest weight loss—even in older adults—can help to prevent the onset of type 2 diabetes and help to manage chronic diseases, such as diabetes, high blood pressure, and abnormal cholesterol.

“Two key strategies for promoting healthy weight and reducing risk of chronic diseases later in life are to ensure high-quality nutrition for women and children and reduce psychosocial stress. Whether people are ‘over-caloried’ or over-stressed, the effect is the same.”

—Ann Bullock, M.D., IHS Chief Clinical Consultant for Family Practice and Medical Advisor,  
IHS Division of Diabetes Treatment and Prevention

### We All Have a Role!

The Indian Health Service, in collaboration with its partners, is determined to make a substantial and sustained effort to promote healthy weight across the lifespan in American Indian and Alaska Native communities. Given the multitude of factors that contribute to obesity and overweight, there is no one single approach that will work to turn the problem around. That is why individuals, families, schools, worksites, communities, the health care system, Tribal leaders and Tribal organizations, and society as a whole all have a role to play in achieving our vision for healthy weight across the lifespan.



“For years, we have encouraged Americans to eat better, exercise regularly, and maintain healthier lifestyles. But for these things to happen, Americans need to live and work in environments that support their efforts. There is a growing consensus that we, as a nation, need to create communities and environments where the healthy choices are the easy and the affordable choices.”

—U.S. Surgeon General Regina M. Benjamin, M.D., M.B.A.

The **Social-Ecological Model**, currently used by the public health community, provides a framework for addressing and influencing a person’s physical, social, and cultural surroundings to support long-term, healthy lifestyle choices for maintaining a healthy weight. As shown in Figure 1, the model, which encompasses all of the key sectors of society, is consistent with the value of connectedness of self, community, and place, intrinsic in American Indians and Alaska Natives as they strive for harmony and balance in life.

Figure 1. Harmony and Balance in Life: Applying the Social-Ecological Model in AI/AN Communities



Adapted from: Diabetes Care, November 2008, Vol. 31 (11), page 2217.

### Society

This all-encompassing category involves communities, organizations, families, and individuals—all working together for change. Healthful nutrition and physical activity legislation, statewide school policies, media campaigns, and partnerships with Tribes are just some of the ways a comprehensive strategy to promote healthy weight across the lifespan takes shape on a large scale.

For American Indians and Alaska Natives, this means:

- » All levels of society working together.
- » Promoting healthy weight across the lifespan as a cultural, societal norm.

### Communities

Community organizations include schools, worksites, the health care system, and Tribal organizations. These organizations can help individuals make better choices about healthful eating and physical activity by making changes in organizational policies and environments and by providing health information.

A community is like a large organization, able to make changes in policy and the environment to give its residents the best possible access to healthful foods and ways to be physically active. Changing zoning ordinances, improving parks, trails, walkways, and recreation facilities, creating ways to grow, gather, and hunt food, or distributing free or inexpensive fresh fruits and vegetables—

these are some of the many ways individuals, groups, and organizations can work together to promote healthy weight.

For American Indians and Alaska Natives, this means:

- » Promoting community ownership and engagement.
- » Increasing community self-empowerment.
- » Engaging in community needs assessments.
- » Providing communities with tools to help them change.
- » Inviting full participation of Tribal leaders.
- » Using the public health or population-based approach.

### Individuals and Families

Close interpersonal groups, such as families and friends, are an important way to encourage more healthful behaviors and to give individuals the knowledge and support they need to make healthful eating and physical activity choices.

For American Indians and Alaska Natives, this means:

- » Promoting self-empowerment and wellness.
- » Strengthening the individual culturally, spiritually, physically, and emotionally (Life in Balance).
- » Connecting individuals to intergenerational activities.
- » Empowering elders to help facilitate change.
- » Family mentoring to pass on healthy habits to children.



“The physical and emotional health of an entire generation and the economic health and security of our nation is at stake. This isn’t the kind of problem that can be solved overnight, but with everyone working together, it can be solved. So, let’s move!”

—*First Lady Michelle Obama*

## Health Care System Actions to Promote Healthy Weight for Life

Treatment of obesity and overweight is essential for preventing and treating diabetes, cardiovascular disease, and many other chronic conditions. These chronic diseases take a major toll on the lives of American Indians and Alaska Natives and divert essential funds from prevention and early intervention. Weight loss improves control of blood glucose, blood pressure, abnormal cholesterol and lipids; it reduces risk of morbidity and mortality, and it lowers medical costs. Health care system changes and reimbursement for services are needed to achieve comprehensive and effective primary health care services for healthy weight management.



IHS health care team

The Indian health care system, including IHS, Tribal, and urban Indian health programs, has the potential to play a major role in helping patients achieve and maintain a healthy weight across the lifespan. Health care providers, nurses, dietitians, pharmacists, public health nutritionists and nurses, community health representatives, and others can influence patients' dietary choices and physical activity behaviors. In addition, as shown in the Social-Ecological Model, health care team members can collaborate with schools, community groups, and worksites to help educate and reinforce healthful eating and regular physical activity, and they can advocate for health care policy changes to help effect change.

"So what does *obesity* have to do with the type of care you as health care professionals provide on a daily basis? I say to you that obesity is *everyone's problem*. Each of us needs to work together as part of the health care team to help prevent obesity and mitigate some of the early problems associated with it. Obesity is already taxing our Indian health system to the breaking point. Unless we begin to work together more proactively to fight this growing problem, I'm afraid that we'll see this problem get worse in the coming years."

—RADM Richie Grinnell, R.S., M.P.H., IHS Nashville Area Director

### Conduct Universal Body Mass Index (BMI) Screening and Assessment

- » Develop a policy on bundling of screening measures (so-called “advanced vital signs”), including BMI and physical activity. Bundle age-specific measures for children’s BMI documentation with physical activity, nutrition, screen time, healthy beverages, and others.
- » Gather and provide accurate and timely clinical data, following clinical guidelines, on BMI for all patients across the lifespan. Measure height and weight and calculate BMI. Put data in patient charts, and track BMI trends.
- » Work collaboratively with the IHS workgroup that addresses accountability measures regarding specific obesity measures as informed by Government Performance and Results Act (GPRA) and Clinical Reporting System (CRS) Part 1.
- » Ensure that appropriate anthropometric measurement devices are available at all IHS-funded sites.
- » Educate all health care personnel on accurate measurement of height and weight and on the use of BMI-for-age as a tool for assessing growth and development.
- » Heighten the role of agency coordinator(s) for data collection and reporting of trends in weight for people at all ages to build a comprehensive database and surveillance system.
- » Promote and implement universal, age-appropriate physical activity screening across the lifespan.

### Provide Pre-conception and Prenatal Counseling and Care



Prenatal care

- » Offer nutrition education and weight management counseling to all women planning pregnancy and to pregnant women.
- » Screen all pregnant women for gestational diabetes at the first prenatal visit and at 24–28 weeks of gestation.
- » Assess weight gain pattern at each prenatal visit.
- » Coordinate prenatal nutrition education and ensure access to optimum healthful foods through the Special Supplemental Nutrition Program for Women, Infants, and Children program (WIC).
- » Offer intensive medical nutrition therapy to women of child-bearing age who have diabetes to ensure healthy weight and excellent blood glucose control at the time of conception and throughout the perinatal period.
- » Provide education to mothers and mothers-to-be (especially to those with gestational diabetes) on the role of modeling and practicing healthful eating and physical activity.
- » Provide education to pregnant women, families, community, and health care staff about the weight management and diabetes prevention benefits of breastfeeding.
- » Intensify public health efforts to prevent maternal smoking before and during pregnancy because of the evidence linking maternal smoking to childhood obesity and diabetes control.

**Provide Breastfeeding and Infant Feeding Education and Support (Post Partum)**



Post partum care

- » Develop a breastfeeding-friendly culture policy based on the World Health Organization’s Ten Steps to Successful Breastfeeding. Establish hospital policies to promote breastfeeding; encourage IHS direct hospitals to work toward Baby-Friendly Hospital designations.
- » Offer breastfeeding support tools, education, and resources to community and health care personnel.

- » Use the infant feeding tool in Electronic Health Records (EHR), Resource and Patient Management System (RPMS), and CRS to monitor trends and follow up with patients.
- » Use the infant feeding tool to measure breastfeeding rates for 2-, 6-, 9-, and 12-month-old infants.
- » Provide post partum followup support for breastfeeding families.
- » Provide mothers and families with resources for breastfeeding support, including contact numbers for national, state, and Tribal breastfeeding coalitions and IHS breastfeeding hotlines.
- » Assist nursing mothers with practical and realistic strategies to continue breastfeeding even when they are separated from their infants by work, school, or other circumstances.
- » Encourage accommodations for breastfeeding mothers at the worksite.
- » Encourage access for breastfeeding employees to resources, such as hospital-grade electric breast pumps and WIC electric breast pumps.
- » If mothers or families choose to bottle feed, provide appropriate education on feeding in response to hunger cues, weaning, timely introduction of solids, and avoidance of overfeeding.
- » Offer nutrition education and weight management counseling to all women post partum.
- » Screen women with gestational diabetes for diabetes 6–12 weeks post partum and follow up with subsequent screening for the development of diabetes or pre-diabetes.

**Implement Comprehensive, Agency-Wide Food Standards Policies for Promoting Healthy Weight**



Healthy Heart worksite nutrition class

- » Implement food standards for hospitals and clinics addressing patient meal service.
- » Implement food standards for worksites addressing employee cafeterias, vending machines, and food vendors that come on campuses, as well as foods served at IHS meetings and events.
- » Implement procurement policies for food and formula.
- » Implement human resources policy changes consistent with the food standards policies.

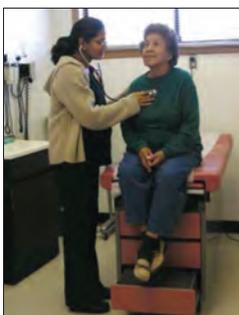
### Implement Universal Nutrition and Physical Activity Education



Medical nutrition therapy, IHS Turtle Mountain Comprehensive Healthcare Center

- » Implement universal health education and awareness campaigns for individuals and families regarding healthful eating behaviors and increased physical activity to promote healthy weight across the lifespan.
- » Encourage parents to support and model healthful eating and engage in regular physical activity with their children.
- » Provide quality information about healthy weight management to patients, health care personnel, and communities through improved information systems and multimedia communications.
- » Offer lifestyle intervention programs for individuals who are overweight. (E.g., provide the Lifestyle Balance program developed by the Special Diabetes Program for Indians to individuals and families through classes and support groups.)
- » Connect people with services that support healthy behaviors, including consulting techniques in cognitive restructuring, motivational interviewing, and group support.
- » Mobilize local health advocates—community health representatives, health promotion/disease prevention area coordinators, health educators, and public health nurses—to promote healthful eating and physical activity in the community.
- » Incorporate traditional and contemporary Native healing and wellness, such as prayer, affirmations, sweats, dances, local medicinals and plants, acupuncture, yoga, and meditation.
- » Promote and advocate for healthful eating and physical activity policies in schools, worksites, Tribal organizations, etc. (See suggested policies in “Healthy Weight for Life: A Vision for Healthy Weight Across the Lifespan of American Indians and Alaska Natives, Actions for Communities, Individuals, and Families.”)
- » Partner with local businesses and organizations to increase access to healthy food and opportunities for physical activity.

### Deliver Quality Health Care



Patient exam, Santa Fe IHS Hospital

- » Identify and disseminate evidence-based best practices regarding healthy weight management; promote consistent messages based on proven science and methods to improve effectiveness.
- » Define the scope of services for healthy weight management and provide guidance to health care personnel by disseminating clinical care guidelines and standards of care.
- » Assess individuals already overweight or obese for complications and co-morbidities. Provide counseling and/or medical nutrition therapy. Identify and refer patients to resources that promote personalized weight reduction, weight management, nutrition, and physical activity.

- » Use the Care Model developed by the IHS Improving Patient Care program (on the Web at [http://www.ihs.gov/ipc/index.cfm?module=dsp\\_ipc\\_improvprog\\_models](http://www.ihs.gov/ipc/index.cfm?module=dsp_ipc_improvprog_models)) to align all resources of the care team to improve quality of care for individuals, families, and communities.
- » Assess and address the behavioral and emotional components that affect an individual's weight and health.
- » Integrate behavioral health into the primary care health care team. In collaboration with the patient, address physical, emotional, cognitive, and financial barriers and develop coping strategies.
- » Understand the unique role behavioral therapy plays in referrals for more complex issues, such as disordered eating and depression.
- » Conduct audits and assessments to monitor the quality of care provided to overweight and obese individuals.
- » Incorporate a quality improvement effort focusing on healthy weight across IHS initiatives and programs (e.g., the Improving Patient Care program, the Special Diabetes Program for Indians, and the Maternal and Child Health initiative).

### Match the Size and Capability of the Workforce to the Disease Burden



Northern Navajo Native Lifestyle Balance staff

- » Increase the number of registered dietitians who plan, facilitate, deliver, and evaluate services to support healthy weight management to meet standardized staffing ratios.
  - » Increase the number of other personnel who plan, facilitate, deliver, and evaluate services to support healthy weight management.
  - » Strengthen workforce skills and role modeling behaviors related to nutrition and physical activity by implementing staff wellness policies and programs.
- » Emphasize training of health care personnel in behavioral modification and motivational interviewing skills in clinical and community settings.
  - » Train health care personnel to be culturally and empathically skilled in working with overweight and obese individuals and to present culturally sensitive, standardized information and curricula/materials. (The IHS Division of Diabetes Treatment and Prevention has best practices for nutrition and physical activity.) Increase awareness, training, and utilization of toolkits for health care personnel on documentation of nutrition and physical activity in the EHR and RPMS.
  - » Increase awareness, training, and utilization of evidence-based best practices regarding healthy weight management.

### Identify Ways to Increase Reimbursement for Healthy Weight Management



Medical nutrition therapy reimbursement team, IHS Turtle Mountain Comprehensive Healthcare Center

- » Determine how to quantify the impact of obesity and overweight on agency resources.
- » Establish a dialogue within the Indian health system and with payers to consider classifying obesity as a disease category for reimbursement coding.
- » Make the case for the cost-effectiveness of prevention and treatment services to promote healthy weight across the lifespan.
- » Develop a business plan for reimbursement of weight management (e.g., medical nutrition therapy, early periodic screening, diagnosis, and treatment).
- » Use the lessons learned from the IHS “Step-by-Step Guide to Medicare Medical Nutrition Therapy Reimbursement” to guide efforts to seek reimbursement for healthy weight management.
- » Promote third-party reimbursement for medical nutrition therapy and other services.

## Agency Actions to Promote Healthy Weight for Life

### Create a Standing Body in the Indian Health System—the Healthy Weight for Life Workgroup—to Help Implement the Vision



Indian Health Service staff

- » Identify the members of a new core workgroup, currently envisioned as a small and responsive team.
- » Convene subcommittees to design and implement IHS' top three priorities.
- » Develop an implementation and evaluation plan for achieving healthy weight goals.
- » Establish working relationships with Tribal leaders who are advising on various IHS initiatives, such as the Special Diabetes Program for Indians.
- » Establish working relationships with leaders in relevant IHS offices, divisions, and programs.
- » Keep healthy weight an agency priority through deliberate, ongoing communications and program marketing (such as a Web site, e-bulletins, listserv messages, articles in IHS Primary Care Provider, etc.).
- » Enlist stakeholders to deliver presentations at key national and regional Indian health meetings.
- » Offer periodic webinars and trainings at national and regional meetings to promote healthy weight management throughout the Indian health system.
- » Develop companion “how to” toolkits for key audiences to implement healthy weight management strategies (such as the IHS Physical Activity Kit developed by the Health Promotion/Disease Prevention program).
- » Routinely revisit progress on the Healthy Weight for Life initiative during the annual meeting of the Medical Nutrition Therapy Collaborative at the IHS Combined Councils meeting.
- » Oversee, plan, and implement a social marketing campaign (see below).

### Promote and Support Lifestyle Change Strategies for Healthy Weight Across the Lifespan Throughout the Indian Health System



Diabetes regional meeting

- » Implement a comprehensive food standards policy that includes patient meal service, employee cafeterias, vending machines, formula and food procurement, as well as foods and beverages served at IHS functions (including meetings).
- » Coordinate breastfeeding education activities with the IHS national Head Start and Maternal and Child Health programs and with Women, Infants, and Children (WIC) programs.

- » Monitor and track breastfeeding education services and activities in IHS and Tribal facilities.
- » Continue to promote the IHS best practices throughout the Indian health system.
- » Increase the number and types of trained personnel who plan, facilitate, deliver, and evaluate community programs to promote healthful eating and physical activity.
- » Ensure that all chronic disease, behavioral health, and health promotion and disease prevention programs and initiatives throughout IHS incorporate healthful eating and physical activity programs into their work plans.
- » Monitor and track programs and activities designed to promote regular, lifelong healthful eating and physical activity.
- » Assess and update IHS workplace wellness policies related to healthful eating and physical activity.
- » Promote a healthy weight norm in the IHS workforce by implementing organized wellness programs and events, including: healthful eating education programs; healthy foods in vending machines and cafeterias; healthy weight loss programs (rather than rapid weight loss competitions); and physical activity programs, such as the Physical Activity Kit, the Just Move It campaign, and the use of pedometers to increase the number of steps per day.
- » Promote and implement universal, age-appropriate physical activity screening across the lifespan.

#### **Increase Quality Improvement, Program Evaluation, and Research on Healthy Weight Management**

- » Work collaboratively with the American Indian and Alaska Native Health Research Advisory Council (<http://www.omhrc.gov/hrac/>).
- » Partner with Envision New Mexico, a project of the Department of Pediatrics at the University of New Mexico Health Sciences Center (<http://www.envisionnm.org>).
- » Partner with: the Committee on Native American Child Health of the American Academy of Pediatrics (AAP) (<http://www.aap.org/NACH/>); the American Association of Indian Physicians (<http://www.aaip.org/>); First Nations Behavioral Health Association (<http://www.fnbha.org/>); the Society of Indian Psychologists (<http://aiansip.org/>); the Indian Country section of the American Psychological Association Psychologists in Public Service; and others.
- » Partner with the National Institutes of Health (NIH), the Centers for Disease Control and Prevention (CDC), and the Agency for Healthcare Research and Quality to support healthy weight management research and evaluation among AI/AN.
- » Partner with Native American Research Centers for Health (<http://www.ihs.gov/medicalprograms/research/narch.cfm>).

#### **Foster Collaboration and Innovation Across the Indian Health System and With External Partners**

- » Strengthen and expand partnerships with Tribal leaders and Tribal organizations.
- » Develop and maintain partnerships within IHS and with other Federal agencies to ensure

AI/AN have access to services and funding opportunities related to healthy weight management, including:

- The Department of Health and Human Services, including the Centers for Medicare and Medicaid Services, the Health Resources and Services Administration, the CDC, and the Administration for Children and Families.
  - The Department of Agriculture, including cooperative extension programs, Food Distribution Program on Indian Reservations, WIC, school nutrition programs, and senior meals on wheels programs.
  - The Department of the Interior, including the Bureau of Indian Affairs.
  - The Department of Housing and Urban Development.
  - The Department of Justice.
- » Strengthen and enhance partnerships with non-Federal agencies, managed care systems, universities, and private foundations.

### **Design and Launch a Web Site to Promote Healthy Weight Management Strategies**

- » Create a Web site to provide healthy weight management resources, such as the “Surgeon General’s Vision for a Healthy and Fit Nation 2010,” clinical guidelines, evidence-based best and promising practices, success stories, toolkits, PowerPoint slides, and awareness campaign messages.
- » Coordinate with the Health Promotion/Disease Prevention program and the Special Diabetes Program for Indians regarding resources already compiled.
- » Create a SharePoint site for the Healthy Weight for Life Workgroup to exchange information.
- » Create a database or data mart; link to CRS page with BMI.

### **Plan and Implement a Social Marketing Campaign to Promote Healthy Weight**



- » Compile examples of existing healthy weight campaign messages that could be adopted or tailored for use in AI/AN communities (e.g., the 5-2-1-0, Small Step (HHS), and Just Move It campaigns).
- » Pre-test the healthy weight campaign messages in focus groups with AI/AN audiences.
- » Identify messages that are most appealing to AI/AN audiences.
- » Prepare a communications plan for a healthy weight awareness campaign.
- » Produce campaign messages and materials as outlined in the plan.
- » Disseminate the campaign to AI/AN communities throughout the Indian health system, via regional and national meetings, the media, the Internet, and local community channels.

## Resources for Healthy Weight Management

### Food and Nutrition

Indian Health Service Division of Diabetes Treatment and Prevention. “Indian Health Diabetes Best Practice Nutrition for Diabetes Prevention and Care.” Albuquerque, NM, 2009. The revised 2009 Indian Health Diabetes Best Practices are consensus-based approaches, developed by Indian health system professionals, for use in clinical and community settings to implement or improve diabetes treatment and prevention. These best practices describe nutrition recommendations that target people who are at risk of developing diabetes or currently living with diabetes.

[http://www.ihs.gov/MedicalPrograms/Diabetes/HomeDocs/Tools/BestPractices/2009\\_BP\\_Nutrition.pdf](http://www.ihs.gov/MedicalPrograms/Diabetes/HomeDocs/Tools/BestPractices/2009_BP_Nutrition.pdf)

Indian Health Service Nutrition Program. “Strengthen the Family Circle.” The American Indian adaptation of the Dietary Guidelines for Americans features emotion-based messages and materials, including tips for healthy eating by AI/AN.

<http://www.ihs.gov/MedicalPrograms/Nutrition/documents/IHS6-handouts.pdf>

U.S. Department of Health and Human Services and U.S. Department of Agriculture. “Dietary Guidelines for Americans, 2010.” 7th Edition, Washington, DC: U.S. Government Printing Office, December 2011. The Dietary Guidelines for Americans are the cornerstone of Federal nutrition policy and nutrition education activities. The Dietary Guidelines are jointly issued and updated every 5 years by the Departments of Agriculture and Health and Human Services (HHS). They provide authoritative advice for people 2 years and older about how dietary habits can promote health and reduce risk for major chronic diseases.

<http://www.dietaryguidelines.gov>

**WIN.** The Weight-control Information Network is a service of the National Institute of Diabetes and Digestive and Kidney Diseases (NIDDK) of the National Institutes of Health (NIH), the Federal Government’s lead agency responsible for biomedical research on nutrition and obesity. WIN provides the general public, health professionals, the media, and Congress with up-to-date, science-based information on weight control, obesity, physical activity, and related nutritional issues.

<http://www.win.niddk.nih.gov>

## Physical Activity

Indian Health Service Division of Diabetes Treatment and Prevention. “Indian Health Diabetes Best Practice Physical Activity for Diabetes Prevention and Care.” Albuquerque, NM, 2009. The revised 2009 Indian Health Diabetes Best Practices are consensus-based approaches, developed by Indian health system professionals, for use in clinical and community settings to implement or improve diabetes treatment and prevention. This best practice describes physical activity recommendations for any person at risk for developing diabetes or living with diabetes.

[http://www.ihs.gov/MedicalPrograms/Diabetes/HomeDocs/Tools/BestPractices/2009\\_BP\\_Physical\\_Activity.pdf](http://www.ihs.gov/MedicalPrograms/Diabetes/HomeDocs/Tools/BestPractices/2009_BP_Physical_Activity.pdf)

Indian Health Service Health Promotion/Disease Prevention and University of New Mexico Prevention Research Center. “Physical Activity Kit (PAK): Staying on the Active Path in Native Communities ... a Lifespan Approach!” Albuquerque, NM, 2009. The goal of the comprehensive kit is to promote age- and culture-appropriate physical activities across the lifespan in Native American communities to increase each person’s time spent in moderate-to-vigorous physical activity. The kit has been successfully received in field testing in Tribal communities.

[http://www.ihs.gov/hpdp/index.cfm?module=dsp\\_hpdp\\_resources\\_physicalactivitykit](http://www.ihs.gov/hpdp/index.cfm?module=dsp_hpdp_resources_physicalactivitykit)

U.S. Department of Health and Human Services. “2008 Physical Activity Guidelines for Americans.” Washington, D.C. 2008. The Physical Activity Guidelines for Americans are the most comprehensive of their kind. Adults gain substantial health benefits from 2½ hours a week of moderate aerobic physical activity, and children benefit from an hour or more of physical activity a day, according to these guidelines. The guidelines are designed so people can fit physical activity into their daily plans and incorporate activities they enjoy.

<http://www.health.gov/paguidelines/>

**U.S. National Physical Activity Plan** is a private-public sector collaborative, engaging hundreds of organizations dedicated to changing our communities in ways that will enable every American to be sufficiently physically active. The National Plan aims to create a culture that supports physically active lifestyles for the ultimate purposes of improving health, preventing disease and disability, and enhancing quality of life.

<http://physicalactivityplan.org/>

## Infants and Toddlers

Administration for Children and Families, Office of Head Start. **Early Childhood Learning and Knowledge Center.** The Center offers relevant, timely information, knowledge, and learning to Head Start programs and the early childhood community in an easy-to-use format. It is a comprehensive resource for anyone involved with, or interested in, early childhood education, health, and wellness.

<http://eclkc.ohs.acf.hhs.gov/hslc>

Head Start Performance Standards and other subjects can be found at:

[http://eclkc.ohs.acf.hhs.gov/hslc/Program Design and Management/Head Start Requirements/Head Start Requirements](http://eclkc.ohs.acf.hhs.gov/hslc/Program%20Design%20and%20Management/Head%20Start%20Requirements/Head%20Start%20Requirements)

Indian Health Service Web Site on Breastfeeding. IHS Breastfeeding Web page, part of the Maternal and Child Health Web site, provides moms, dads, parents, communities, and health care team members evidence-based information on human milk, lactation, and milk expression. Visitors to the site can join a listserv, scan frequently asked questions, and find links to other breastfeeding sites, making this the “go to” IHS reference site.

<http://www.ihs.gov/MedicalPrograms/MCH/M/bf.cfm>

Indian Health Service Division of Diabetes Treatment and Prevention. “Indian Health Diabetes Best Practice Breastfeeding Support.” Albuquerque, NM, 2009. The revised 2009 Indian Health Diabetes Best Practices are consensus-based approaches, developed by Indian health system professionals, for use in clinical and community settings to implement or improve diabetes treatment and prevention. This best practice provides clinical tools and technical resources to effectively support breastfeeding.

[http://www.ihs.gov/MedicalPrograms/Diabetes/HomeDocs/Tools/BestPractices/2009\\_BP\\_Breastfeeding.pdf](http://www.ihs.gov/MedicalPrograms/Diabetes/HomeDocs/Tools/BestPractices/2009_BP_Breastfeeding.pdf)

U.S. Department of Agriculture, WIC Program. “Infant Nutrition and Feeding.” This handbook provides an overview of topics related to infant nutrition and feeding and answers some common questions on feeding infants. Chapter topics include: the nutritional needs of infants; the development of feeding skills; breastfeeding; formula feeding; the introduction of complementary foods; oral health; obesity; and physical activity and motor skill development. It is available as a PDF.

[http://www.nal.usda.gov/wicworks/Topics/Infant\\_Feeding\\_Guide.html#guide](http://www.nal.usda.gov/wicworks/Topics/Infant_Feeding_Guide.html#guide)

U.S. Department of Health and Human Services, Office on Women’s Health. “An Easy Guide to Breastfeeding for American Indian and Alaska Native Families.” This 28-page online booklet is for all American Indian and Alaska Native women and their families who choose to breastfeed. The booklet covers healthcare benefits, planning, workplace accommodations, and the father’s role in an easy-to-read text, designed to answer women’s and families’ questions.

<http://www.womenshealth.gov/pub/BF.AIAN.pdf>

## **Children and Adolescents**

American Academy of Pediatrics. “5-2-1-0 Pediatric Obesity Clinical Decision Support Chart.” This flipchart, a BMI calculator, and other clinical tools provide health care team members with practical support and guidance to help improve care and outcomes for overweight children.

[http://www.aap.org/obesity/clinical\\_resources.html](http://www.aap.org/obesity/clinical_resources.html)

Indian Health Service Division of Diabetes Treatment and Prevention and Division of Information Resource Management. “Promoting a Healthy Weight in Children and Youth: Clinical Strategies, Recommendations, and Best Practices.” Albuquerque, NM, 2008. This IHS report outlines clinical strategies on five childhood obesity prevention and treatment recommendations for health care professionals in Indian Health Service, Tribal, and urban Indian health clinical settings. The report’s five recommendations are based on the best available clinical evidence regarding the prevention and treatment of childhood overweight.

[http://www.diabetes.ihs.gov/HomeDocs/Tools/ClinicalGuidelines/Promoting\\_Healthy\\_Weight\\_1208.pdf](http://www.diabetes.ihs.gov/HomeDocs/Tools/ClinicalGuidelines/Promoting_Healthy_Weight_1208.pdf)

**National Initiative for Children’s Healthcare Quality (NICHQ).** NICHQ is an independent, action-oriented organization dedicated to achieving a world in which all children receive the high-quality health care they need. NICHQ’s current initiatives include the prevention and treatment of childhood obesity and improving perinatal care.

<http://www.nichq.org>

Indian Health Service Head Start Program. “My Amazing Body.” My Amazing Body is a comprehensive curriculum that meets the Head Start Performance Standards. The curriculum is specifically designed for American Indian and Alaska Native Head Start children, with the intent to include exercise and nutrition. My Amazing Body is divided into 10 lesson plans that incorporate a weekly nutritional experience, physical activity, and teacher and parent resources. The lesson plans are divided into “Learning Circle” and “Hands-on Learning Activities.” To assist the teacher, each activity is divided into domains, with measurable objectives, materials needed, and step-by-step instructions. For additional information contact: [IHSHeadStart@ihs.gov](mailto:IHSHeadStart@ihs.gov).

U.S. Department of Health and Human Services, Office on Women's Health. "BodyWorks Program and Toolkit." BodyWorks is designed to help women and girls improve family eating and activity habits. The toolkit includes games, a recipe book, food and fitness journals for teens, and a "how to" video. Ten American Indian sites field tested the Native American version, and the American Indian and Alaska Native version will be available. See general population version at: <http://www.womenshealth.gov/bodyworks/>

## Adults and Elders

Indian Health Service Division of Diabetes Treatment and Prevention. "Indian Health Diabetes Best Practice Adult Weight Management and Diabetes." Albuquerque, NM, 2009. The revised 2009 Indian Health Diabetes Best Practices are consensus-based approaches, developed by Indian health system professionals, for use in clinical and community settings to implement or improve diabetes treatment and prevention. This best practice provides recommendations to achieve and maintain a healthy weight for adults with diabetes regardless of duration of diabetes.

[http://www.ihs.gov/MedicalPrograms/Diabetes/HomeDocs/Tools/BestPractices/2009\\_BP\\_Adult\\_Wt\\_Management.pdf](http://www.ihs.gov/MedicalPrograms/Diabetes/HomeDocs/Tools/BestPractices/2009_BP_Adult_Wt_Management.pdf)

**NIH SeniorHealth.** Easy-to-use Web site features basic health and wellness information for older adults on a variety of nutrition topics. Numerous videos, pamphlets, and online guides are available on healthful eating, shopping, and cooking for adults over 50. Hear the text read aloud or view the videos online. The "Eating Well as You Get Older" section is available at:

<http://nihseniorhealth.gov/eatingwellasyougetolder/toc.html>

The "Exercise and Physical Activity for Older Adults" section is available at:

<http://nihseniorhealth.gov/exerciseforolderadults/toc.html>

National Institute of Diabetes and Digestive and Kidney Diseases. **Diabetes Prevention Program Lifestyle Balance Program Materials.** Participant handouts and lifestyle coach materials are available in PDF and RTF formats.

[http://www.bsc.gwu.edu/dpp/lifestyle/dpp\\_part.html](http://www.bsc.gwu.edu/dpp/lifestyle/dpp_part.html)

## **Governments/ Policymakers**

Indian Health Service. “Indian Health Service Strategic Plan 2006–2011.” Rockville, MD, 2006. The IHS Strategic Planning Workgroup, a diverse group of Indian health stakeholders, developed the plan to leverage the HHS Strategic Plan and the President’s Management Agenda.

<http://www.ihs.gov/PlanningEvaluation/documents/IHSStrategicPlan20062011.pdf>

Institute of Medicine and the National Research Council of the National Academies. “Local Government Actions to Prevent Childhood Obesity.” Washington, DC: National Academies Press, 2009. The Institute of Medicine’s Committee on Childhood Obesity Prevention Actions for Local Governments was convened to identify promising actions that local governments can take to curb obesity among children. The report offers a list of actions that hold the greatest potential to curb obesity rates among children. Many of these steps focus on increasing access to healthy foods and opportunities for active play and exercise.

<http://www.iom.edu/Reports/2009/ChildhoodObesityPreventionLocalGovernments.aspx>

Pitt Barnes, S, Robin, L, Dawkins, N, Leviton, L, and Kettel-Khan, L (2009). “Early Assessment of Programs and Policies to Prevent Childhood Obesity Evaluability Assessment Synthesis Report: Local Wellness Policy.” Atlanta: U.S. Department of Health and Human Services, Centers for Disease Control and Prevention. The report identifies and assesses local-level programs and policies that have been implemented with apparent success to prevent obesity by improving the eating habits and physical activity levels of youth ages 3–17 years.

[http://www.cdc.gov/obesity/downloads/LWP\\_Synthesis\\_Report.pdf](http://www.cdc.gov/obesity/downloads/LWP_Synthesis_Report.pdf)

U.S. Department of Health and Human Services. “The Surgeon General’s Vision for a Healthy and Fit Nation” Rockville, MD: Office of the Surgeon General, January 2010. The recommendations identify opportunities for improving our communities, encouraging healthy choices and healthy home environments, creating healthy child care settings, creating healthy schools, creating healthy work sites and mobilizing medical communities.

<http://www.surgeongeneral.gov/library/obesityvision/obesityvision2010.pdf>

U.S. Department of Health and Human Services. “The Surgeon General’s Call to Action to Prevent and Decrease Overweight and Obesity: Overweight in Children and Adolescents.” Washington, DC. This online fact sheet describes the causes of overweight in youth, assessment of growth, and tips for families on physical activity and healthful eating.

[http://www.surgeongeneral.gov/topics/obesity/calltoaction/fact\\_adolescents.htm](http://www.surgeongeneral.gov/topics/obesity/calltoaction/fact_adolescents.htm)

U.S. Department of Health and Human Services. “The Surgeon General’s Call to Action to Prevent and Decrease Overweight and Obesity, 2001.” Washington, DC. 2001. The Call to Action Report outlines strategies that communities can use in helping to address the problems. These options include requiring physical education at all school grades, providing more healthy food options on school campuses, and providing safe and accessible recreational facilities for residents of all ages. <http://www.surgeongeneral.gov/topics/obesity/>

## Schools and Programs for Youth

Centers for Disease Control and Prevention. “Children’s BMI Tool for Schools.” The Children’s BMI Tool for Schools is an Excel spreadsheet intended for use by school, child care, and other professionals who want to compute BMI-for-age for a group of up to 2,000 children (e.g., a school classroom or grade). This calculator computes BMI and BMI percentiles for individual children in a group using height and weight measurements, sex, date of birth, and date of measurement information. It provides a group summary of children’s BMI-for-age categories and graphs for prevalence of overweight and obesity and for prevalence of overweight and obesity by sex. [http://www.cdc.gov/healthyweight/assessing/bmi/childrens\\_bmi/tool\\_for\\_schools.html](http://www.cdc.gov/healthyweight/assessing/bmi/childrens_bmi/tool_for_schools.html)

Indian Health Service Division of Diabetes Treatment and Prevention. “Indian Health Diabetes Best Practice School Health: Promoting Healthy Habits and Preventing Disease.” Albuquerque, NM, 2009. The revised 2009 Indian Health Diabetes Best Practices are consensus-based approaches, developed by Indian health system professionals, for use in clinical and community settings to implement or improve diabetes treatment and prevention. This best practice presents recommendations for comprehensive school health programs that serve youth of all ages. [http://www.diabetes.ihs.gov/HomeDocs/Tools/BestPractices/2009\\_BP\\_School\\_Health.pdf](http://www.diabetes.ihs.gov/HomeDocs/Tools/BestPractices/2009_BP_School_Health.pdf)

Indian Health Service Head Start Program. “My Amazing Body.” My Amazing Body is a comprehensive curriculum that meets the Head Start Performance Standards. The curriculum is specifically designed for American Indian and Alaska Native Head Start children with the intent to include exercise and nutrition. My Amazing Body is divided into 10 lesson plans that incorporate a weekly nutritional experience, physical activity, and teacher and parent resources. The lesson plans are divided into “Learning Circle” and “Hands-on Learning Activities.” To assist the teacher, each activity is divided into domains with measurable objectives, materials needed, and step-by-step instructions. For additional information contact: [IHSHeadStart@ihs.gov](mailto:IHSHeadStart@ihs.gov).

**Comprehensive School Physical Activity Programs Package** is an online resource of the National Association for Sport and Physical Education. The program advocates physical activity programming before, during, and after the school day and includes quality physical education, school-based physical activity opportunities, school employee wellness and involvement, and family and community involvement.

<http://www.aahperd.org/naspe/publications/teachingTools/cspa.cfm>

**Move It! And Reduce Your Risk for Diabetes School Kit**, developed by the American Indian/Alaska Native Workgroup of the National Diabetes Education Program, helps schools develop programs that promote physical activity among American Indian and Alaska Native youth. The Move It! kit includes customizable posters of youth engaging in fun physical activities, a fact sheet that can be used as a teaching aid, and sample newsletter text for school and community publications.

[http://ndep.nih.gov/media/moveit\\_school\\_kit.pdf](http://ndep.nih.gov/media/moveit_school_kit.pdf)

The **Diabetes Education in Tribal Schools (DETS) Curriculum** for grades K-12 integrates science and Native American traditions to educate students about diabetes and its risk factors and about the importance of nutrition and physical activity in maintaining health and balance in life. The curriculum was developed by the National Institute of Diabetes and Digestive and Kidney Diseases and the IHS Division of Diabetes Treatment and Prevention. Teachers can order a printed copy of the curriculum and related materials from the IHS Division of Diabetes Treatment and Prevention online catalog at:

<http://www.diabetes.ihs.gov/RESOURCES/Catalog/rde/index.cfm?module=catalog&opt=2>

An electronic version is available at Keweenaw Bay Ojibwa Community College Web site:

<http://www.kbocc.org/dets.htm>

## Worksites

The Centers for Disease Control and Prevention's *LEAN Works!* is a Web-based resource that offers interactive tools and evidence-based resources to design effective worksite obesity prevention and control programs, including an obesity cost calculator to estimate how much obesity is costing your company and how much savings your company could reap with different workplace interventions. <http://www.cdc.gov/leanworks/>

Indian Health Service Circular No. 2006–05. “Lactation Support Program.” This IHS Lactation Support in the Workplace Policy, a benefit for IHS employees, their families, and the workplace, is provided online with downloadable toolkit. July 7, 2006.

[http://www.ihs.gov/PublicInfo/Publications/IHSmanual/Circulars/Circ06/Circ06\\_05/circ06\\_05/circ06\\_05.htm](http://www.ihs.gov/PublicInfo/Publications/IHSmanual/Circulars/Circ06/Circ06_05/circ06_05/circ06_05.htm)

## Communities

Indian Health Service, Health Promotion/Disease Prevention and University of New Mexico Prevention Research Center. “Physical Activity Kit (PAK): Staying on the Active Path in Native Communities ... a Lifespan Approach!” Albuquerque, NM, 2009. The goal of the comprehensive kit is to promote age- and culture-appropriate physical activities across the lifespan in Native American communities to increase each person's time spent in moderate-to-vigorous physical activity. The kit has been successfully received in field testing in Tribal communities. [http://www.ihs.gov/hpdp/index.cfm?module=dsp\\_hpdp\\_resources\\_physicalactivitykit](http://www.ihs.gov/hpdp/index.cfm?module=dsp_hpdp_resources_physicalactivitykit)

Indian Health Service. “Healthy Beverages Community Action Kit, 2006.” This kit is designed to help take action to increase access to healthy beverages in Tribal communities. It includes assessment forms, fact sheets, sample letters to Tribal officials, Tribal resolutions, a presentation, and over 25 Web resources. To download the kit, visit the IHS Web site at the link below and click on “Healthy Beverages Kit”:

<http://www.ihs.gov/MedicalPrograms/Nutrition/>

Khan L, Sobush K, Keener D, Goodman K, Lowry A, Kakietek J, Zaro S. “Recommended Community Strategies and Measurements to Prevent Obesity in the United States.” *Morbidity and Mortality Weekly Report*. July 24, 2009. Vol. 58 (RR–7). The 24 recommended community strategies represent a first step that communities can use to assess local policies and environments that support healthy eating and active living.

<http://www.cdc.gov/mmwr/PDF/rr/rr5807.pdf>

A companion manual, “Implementation and Measurement Guide,” shows how local governments can use community strategies and measures of environmental and policy change.

[http://www.cdc.gov/obesity/downloads/community\\_strategies\\_guide.pdf](http://www.cdc.gov/obesity/downloads/community_strategies_guide.pdf)

A walkable environment naturally supports children as they play, exercise, and go to school. But, pedestrian death and injury rates on Tribal roads are very high. The **Tribal School Zone Safety** toolkit from the Office of Federal Lands Highway (U.S. Department of Transportation) has videos and publications to educate children and adults on safe walking on sidewalks, along roads and streets, at bus stops, and through parking lots. “Safety Doesn’t Happen by Accident,” an 8-minute video, primarily targets AI/AN children 9 to 12 years old in classroom or community settings. “Pedestrian Safety: A New Tradition,” a 9.5-minute video produced by Tribal leaders, is geared to Tribal and community elders, parents and guardians of school-age children, school board members, policy makers, and older teens.

<http://flh.fhwa.dot.gov/programs/irr/safety/school-zones.htm>

### Health Care Teams and Leaders

American Academy of Pediatrics. “5-2-1-0 Pediatric Obesity Clinical Decision Support Chart.” This flipchart, a BMI calculator, and other clinical tools provide health care team members with practical support and guidance to help improve care and outcomes for overweight children.

[http://www.aap.org/obesity/clinical\\_resources.html](http://www.aap.org/obesity/clinical_resources.html)

The CDC’s **Body Mass Index** Web site has easy-to-use BMI calculators for adults and for children and teens.

<http://www.cdc.gov/healthyweight/assessing/bmi/>

The CDC has a **Growth Charts** Web site to help pediatricians, nurses, and parents track the growth of children and teens according to CDC and World Health Organization standards.

<http://www.cdc.gov/growthcharts/>

Indian Health Service Division of Diabetes Treatment and Prevention. “Indian Health Diabetes Best Practice Adult Weight Management and Diabetes.” Albuquerque, NM, 2009. The revised 2009 Indian Health Diabetes Best Practices are consensus-based approaches, developed by Indian health system professionals, for use in clinical and community settings to implement or improve diabetes treatment and prevention. This best practice provides recommendations to achieve and maintain a healthy weight for adults with diabetes regardless of duration of diabetes.

[http://www.ihs.gov/MedicalPrograms/Diabetes/HomeDocs/Tools/BestPractices/2009\\_BP\\_Adult\\_Wt\\_Management.pdf](http://www.ihs.gov/MedicalPrograms/Diabetes/HomeDocs/Tools/BestPractices/2009_BP_Adult_Wt_Management.pdf)

Indian Health Service Division of Diabetes Treatment and Prevention. “Indian Health Diabetes Best Practice Breastfeeding Support.” Albuquerque, NM, 2009. The revised 2009 Indian Health Diabetes Best Practices are consensus-based approaches, developed by Indian health system professionals, for use in clinical and community settings to implement or improve diabetes treatment and prevention. This best practice provides clinical tools and technical resources to effectively support breastfeeding.

[http://www.ihs.gov/MedicalPrograms/Diabetes/HomeDocs/Tools/BestPractices/2009\\_BP\\_Breastfeeding.pdf](http://www.ihs.gov/MedicalPrograms/Diabetes/HomeDocs/Tools/BestPractices/2009_BP_Breastfeeding.pdf)

Indian Health Service Division of Diabetes Treatment and Prevention. “Indian Health Diabetes Best Practice Nutrition for Diabetes Prevention and Care.” Albuquerque, NM, 2009. The revised 2009 Indian Health Diabetes Best Practices are consensus-based approaches, developed by Indian health system professionals, for use in clinical and community settings to implement or improve diabetes treatment and prevention. These best practices describe nutrition recommendations that target people who are at risk of developing diabetes or currently living with diabetes.

[http://www.ihs.gov/MedicalPrograms/Diabetes/HomeDocs/Tools/BestPractices/2009\\_BP\\_Nutrition.pdf](http://www.ihs.gov/MedicalPrograms/Diabetes/HomeDocs/Tools/BestPractices/2009_BP_Nutrition.pdf)

Indian Health Service Division of Diabetes Treatment and Prevention. “Indian Health Diabetes Best Practice Physical Activity for Diabetes Prevention and Care.” Albuquerque, NM, 2009. The revised 2009 Indian Health Diabetes Best Practices are consensus-based approaches, developed by Indian health system professionals, for use in clinical and community settings to implement or improve diabetes treatment and prevention. This best practice describes physical activity recommendations for any person at risk for developing diabetes or living with diabetes.

[http://www.ihs.gov/MedicalPrograms/Diabetes/HomeDocs/Tools/BestPractices/2009\\_BP\\_Physical\\_Activity.pdf](http://www.ihs.gov/MedicalPrograms/Diabetes/HomeDocs/Tools/BestPractices/2009_BP_Physical_Activity.pdf)

Indian Health Service Division of Diabetes Treatment and Prevention. “Step-by-Step Guide to Medicare Medical Nutrition Therapy Reimbursement.” Albuquerque, NM, 2010 (in press). Updated from July 2006 edition, this guide shows how teamwork among health care providers, executives, and data entry and billing personnel makes a difference—not only to the health of patients by increasing access to nutrition services, but also to a clinic’s financial bottom line.

Coming soon to:

<http://www.ihs.gov/medicalprograms/diabetes/>

Indian Health Service Division of Diabetes Treatment and Prevention and Division of Information Resource Management. “Promoting a Healthy Weight in Children and Youth: Clinical Strategies, Recommendations, and Best Practices.” Albuquerque, NM, 2008. This IHS report outlines clinical strategies on five childhood obesity prevention and treatment recommendations for health care professionals in Indian Health Service, Tribal, and urban Indian health clinical settings. The report’s five recommendations are based on the best available clinical evidence regarding the prevention and treatment of childhood overweight.

[http://www.diabetes.ihs.gov/HomeDocs/Tools/ClinicalGuidelines/Promoting\\_Healthy\\_Weight\\_1208.pdf](http://www.diabetes.ihs.gov/HomeDocs/Tools/ClinicalGuidelines/Promoting_Healthy_Weight_1208.pdf)

Indian Health Service and Inter Tribal Council of Arizona, Inc. “American Indian and Alaska Native Pediatric Height and Weight Study Web Site: Training Guide.” The guide illustrates correct procedures for weighing or measuring an infant or child.

<http://www.ihs.gov/MedicalPrograms/Anthropometrics/index.cfm?module=train&option=guide&newquery=1>

National Heart, Lung, and Blood Institute and North American Association of the Study of Obesity. “The Practical Guide: Identification, Evaluation, and Treatment of Overweight and Obesity in Adults.” Bethesda, MD, 2000. The guide describes how health care practitioners can provide their patients with the direction and support needed to effectively lose weight and keep it off. It provides the basic tools needed to appropriately assess and manage overweight and obesity. The guide includes practical information on dietary therapy, physical activity, and behavior therapy, while also providing guidance on the appropriate use of pharmacotherapy and surgery as treatment options.

[http://www.nhlbi.nih.gov/guidelines/obesity/prctgd\\_c.pdf](http://www.nhlbi.nih.gov/guidelines/obesity/prctgd_c.pdf)

**National Initiative for Children’s Healthcare Quality (NICHQ).** NICHQ’s current initiatives focus on ensuring that every child receives care in a high-performing medical home, including the prevention and treatment of childhood obesity and improving perinatal care.

<http://www.nichq.org>

U.S. Preventive Services Task Force. “Screening for Obesity in Children and Adolescents: U.S. Preventive Services Task Force Recommendation Statement.” *Pediatrics*. February 2010. Vol. 125 (2), pp. 361–367. The task force recommends that clinicians screen children ages 6 years and older for obesity and offer them, or refer them to, intensive counseling and behavioral interventions to promote improvements in weight status.

<http://pediatrics.aappublications.org/cgi/content/full/125/2/361>

## Social Marketing/Awareness Campaigns

The CDC's **Social Marketing for Nutrition and Physical Activity** online course teaches public health professionals how to use social marketing to plan nutrition, physical activity, and obesity prevention programs.

<http://www.cdc.gov/nccdphp/dnpa/socialmarketing/training/>

Just Move It is a national campaign to promote physical activity for American Indians and Alaska Natives. Use the Web site below to learn how to start an activity in your own community, share information about ongoing programs, contribute stories, find resources, and enter information in Just Move It's calendar.

<http://justmoveit.org/jmi/home.htm>

The Let's Move! campaign has an ambitious, but important, goal: to solve the epidemic of childhood obesity within a generation. Join First Lady Michelle Obama, community leaders, teachers, doctors, nurses, moms, and dads in a nationwide campaign to tackle the challenge of childhood obesity.

<http://www.letsmove.gov/>

McCormack Brown, K., Alfonso, M.L., and Bryant, C.A. "Obesity Prevention Coordinators' Social Marketing Guidebook." Tampa, FL, 2004. Developed by the Florida Prevention Research Center at the University of South Florida, the guidebook, provides instruction on how to coordinate a social marketing intervention for nutrition, physical activity, or obesity prevention. It includes worksheets, tools, and information to help in the management and coordination of a social marketing program. The guidebook supplements the CDCynergy Social Marketing Edition, an interactive training and decision-support tool, and adds practical tips and information specific to nutrition, physical activity, and obesity.

<http://health.usf.edu/NR/rdonlyres/1F6E6B64-967D-45D1-8BC1-357EC9B3BC30/24125/ObesityPreventionCoordinatorsSocialMarketingG.pdf>

National Diabetes Education Program (NDEP). **We Have the Power to Prevent Diabetes.**

Radio and print public service ads and tip sheets, tailored for American Indians and Alaska Natives at risk for type 2 diabetes, promote moving more and eating less to lower their risk for diabetes.

Copyright-free ads and tip sheets can be downloaded from the NDEP Web site.

Print ads: [http://www.ndep.nih.gov/media/Power\\_ads\\_ai.pdf](http://www.ndep.nih.gov/media/Power_ads_ai.pdf)

Radio ads: <http://www.ndep.nih.gov/resources/ResourceDetail.aspx?ResId=78>

Tip Sheets: [http://www.ndep.nih.gov/media/Power\\_tips.pdf](http://www.ndep.nih.gov/media/Power_tips.pdf)

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IHS wishes to thank everyone who contributed photos or are seen in the photos in this publication.

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**Top row:** Prenatal care, IHS facility (Source: “IHS Strategic Plan 2006–2011”)

**Second row, from left:** IHS health care team (Source: “IHS Strategic Plan 2006–2011”);

Postpartum care, IHS facility (Source: “IHS Strategic Plan 2006–2011”)

**Third row, from left:** Patient exam, Santa Fe Indian Hospital (Source: Diane Phillips); center,

Health care team, Wewoka Service Unit (Source: Kelli Wilson); Community nutrition lesson,

Ohkay Owingeh Pueblo (Source: Diane Phillips)

P. iii. Yvette Roubideaux, MD, MPH, Director, Indian Health Service (Source: IHS Director’s Blog)

P. 2. Youth of the Six Nations Territory Unity Run (Source: “IHS Health for Native Life”)

P. 4. Indian health facility newborn (Source: “Indian Health Service Strategic Plan 2006–2011”)

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P. 5. White Mountain Apache elder (Source: “IHS Health for Native Life”)

P. 6. U. S. Surgeon General Regina M. Benjamin, MD, MBA (Source: Office of the Surgeon General)

P. 8. First Lady Michelle Obama (Source: The White House)

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P. 11. Healthy Heart worksite nutrition class (Source: IHS Healthy Heart Demonstration Project)

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P. 13. Northern Navajo Native Lifestyle Balance staff (Source: “IHS Special Diabetes Program for Indians 2007 Report to Congress”)

P. 14. Medical nutrition therapy reimbursement team, IHS Turtle Mountain Comprehensive Healthcare Center (Source: Jody Rosendahl)

P. 15. Indian Health Service staff (Source: “IHS Strategic Plan 2006–2011”)

P. 15. Diabetes regional meeting (Source: “IHS Special Diabetes Program for Indians 2007 Report to Congress”)

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