

## IS HEALTHFUL EATING BORN OR MADE?

**I**s healthful eating born or made? This question was recently posed to attendees by Dr. Jennifer Orlet Fisher, one of the keynote speakers at Nutrition Connections, the 2nd National Nutrition Education Conference sponsored by the US Department of Agriculture.

Dr. Fisher, an Assistant Professor of Pediatrics at the Children's Nutrition Research Center, approached the topic in a fascinating way. Those who believe healthful eating is

inherited, might say, "My son is not going to eat that because his father never does." Others might say, "It's the environment – with all those advertisements for junk food, how can we expect children to eat healthy?"

According to Dr. Fisher, "Research conducted over the past 40 years shows that children's eating behavior reflects unlearned tendencies as well as the environmental conditions in which eating occurs."

Some classic studies indicate that young children, despite appearing to have erratic appetites are sensitive to the energy content (calories) of the foods they consume. They use this to self-regulate intake. However, Dr. Fisher adds that this wonderful innate capability of children can be easily overturned by overeager parents.

In addition to knowing how much to eat, children appear to have unlearned taste preferences. Infants show a preference for sweets and reject bitter and sour tastes. It is not until the weaning period that a preference for salty tastes emerges. Pre-school age children appear to prefer levels of sourness that most adults would dislike.

This innate preference for sweetness is thought to have evolved to encourage consumption of energy containing foods, while the rejection of bitter tastes is thought to protect children from harmful substances.

One question Dr. Fisher attempted to answer was, "Can parents influence the eating behavior of their children?" She shared this descriptive model based on her research.

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## EAT RIGHT, EXERCISE, HAVE FUN

**E**at Right, Exercise, Have Fun is the slogan that accompanies the new MyPyramid for Kids released September 28, 2005. Visit the website [www.mypyramid.gov/kids](http://www.mypyramid.gov/kids) to learn more.



Highlights of the new kids version of MyPyramid found on the website include:

### **The MyPyramid Blast Off Game**

An interactive computer game where kids can reach Planet Power by fueling their rocket with food and physical activity. "Fuel" tanks for each food group help kids keep track of how their food choices fit into MyPyramid.

### **Poster**

One side of the two-sided poster is for younger children and illustrates many action ideas. The other side, for older elementary school children, includes written messages with the graphics.

### **Don't sugarcoat it**

Choose foods and beverages that do not have sugar and caloric sweeteners as one of the first ingredients. Added sugars contribute calories with few, if any, nutrients.

### **Coloring Page**

Children have a chance to color a black and white line drawing and add their own favorite foods.

### **Tips for Families**

Seven "Eat Right" tips for families and seven "Exercise" tips for families give action-oriented suggestions to follow, such as

### **Set up a home gym**

Use household items, such as canned foods, as weights. Stairs can substitute for stair machines.

Visit the website  
[www.mypyramid.gov/kids](http://www.mypyramid.gov/kids)  
to learn more.❖

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# VOLUNTEERS

Houston-area residents are invited to participate in the following nutrition research projects designed to help CNRC scientists learn more about the nutritional needs of children. Free transportation and parking are available.

## INSULIN RESISTANCE, BONE MINERAL DENSITY STUDY

Healthy children, age 1-10 years, needed for overnight research center stay. Collection of blood and urine, and DEXA scan for bone mineral density. Child cannot have parent or sibling with diabetes. Stipend. Call Dr. French, 832-822-3759.

## TWO BREAST FEEDING STUDIES

New mothers, 18-35 years old, healthy, non-obese, not taking any medications (including birth control) and exclusively breastfeeding infants less than 10 weeks of age are needed for two studies. One study will investigate factors that affect messenger RNA in breast milk. Participants will use an electric breast milk pump during an overnight stay at Texas Children's Hospital with their infant. The second study will investigate factors that affect breast milk production. Stipend. Call Marilyn, 713-798-7002.

## Starting Again! BIOLOGICAL DIVERSITY OF GROWTH

Individuals less than 22 years old who have previously participated in CNRC studies involving body composition measurements are needed for a study on growth. Stipend. Call Marilyn, 713-798-7002.

## BABIES FIRST STUDY

Infants approaching 12 months of age and their mothers are needed for a study of infant eating patterns, food preferences and growth. Stipend. Call Marilyn, 713-798-7002.

## FIRST BITES

Healthy 7- to 11-month-old infants and 12- to-24 month-old toddlers and their mothers are needed for a study to determine how much children this age are eating. Stipend. Call Marilyn, 713-798-7002.

## MIGHTY MINERALS STUDY

Healthy toddlers, 12 to 48 months of age, are needed for a study of toddler nutritional needs. Stipend. Email Keli, kelih@bcm.edu, or call 713-798-7085.

## INSULIN RESISTANCE, BONE CARBOHYDRATE AND SUGAR METABOLISM

Normal-weight and overweight teens ages 13 to 17 years are needed for metabolism studies. The teens should be healthy, not on medications and not have a diabetic parent or sibling. The teens should not be enrolled in sports or currently trying to diet or lose weight. Study includes 12 weeks of supervised exercise with an exercise physiologist. Stipend. Call Marilyn, 713-798-7002.

## PHYSICAL ACTIVITY PROBLEM SOLVING INVENTORY

14 to 15 year olds are needed to help review a questionnaire on physical activity problem solving for teens and to offer suggestions to make it better. Stipend. Call Rinku, 713-798-0506 or email rbhatt@bcm.edu.

## HYPERTENSION PREVENTION USING SOY

Healthy post-menopausal women age 40 and over are needed for a 6-week study using soy in the place of high blood pressure medication. Women cannot be taking hormone replacement therapy and/or blood pressure medication or be vegetarians. Blood pressure levels must be moderately elevated (130/80 to 160/100). Stipend. Call the Soy Study Coordinator, 713-798-6783. ❖

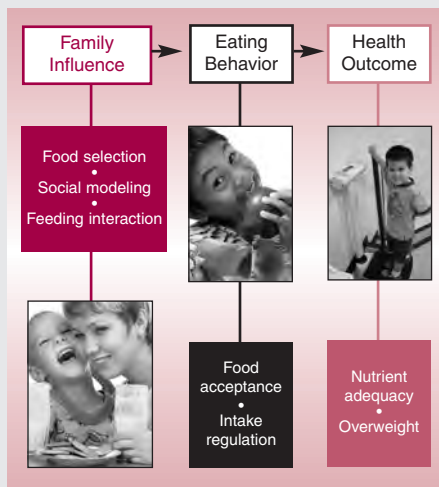
## IS HEALTHFUL EATING BORN OR MADE?

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Parents influence the types and amounts of foods their children consume by selecting which foods to include in the family's diet—both in and outside the home.

Parents and caregivers can:

- provide a model of eating behavior that children learn to follow
- decide who and what is present when children eat
- provide appropriate portions of healthy nutritious food.



To learn more about this conference including other presentations, go to the following website [www.fns.usda.gov/oane/menu/NNEC/Program.htm](http://www.fns.usda.gov/oane/menu/NNEC/Program.htm) ❖

You can learn more about Dr. Fisher's research at the Children's Nutrition Research Center website [www.kidsnutrition.org](http://www.kidsnutrition.org), or Dr. Fisher's faculty page [www.kidsnutrition.org/faculty/fisher](http://www.kidsnutrition.org/faculty/fisher)

# METABOLIC SYNDROME THE FASTEST GROWING DISEASE

Chances are you have heard about Metabolic Syndrome, now one of the fastest growing adverse health conditions in the world. Recent estimates suggest it will soon overtake cigarette smoking as the number 1 risk factor for heart disease in the US population. Some estimate that 50% of adults may have Metabolic Syndrome by age 60.

## What is Metabolic Syndrome?

A condition characterized by a group of metabolic risk factors including:

- Overweight or obesity
- High triglyceride levels
- High blood pressure
- Pre-diabetes

It is a disease that has its beginnings in childhood. In fact, 30 to 50 percent of today's overweight children have symptoms of Metabolic Syndrome.

Dr. John Foreyt, Professor of Pediatrics at the Children's Nutrition Research Center and Director of the Nutrition Research Clinic at Baylor College of Medicine has developed a "toolbox" of strategies for physicians to use when combating this disease." Dr. Foreyt explains, "No two patients are alike, and being able to tailor interventions to the unique needs of each patient

increases the likelihood of long-term success." He adds, "The best part of these lifestyle intervention strategies is that they can be used by everyone to help develop healthful lifestyles."

The lifestyle-change strategies – including setting reasonable goals, raising awareness, confronting barriers, managing stress, cognitive restructuring (thinking about yourself in a more positive, realistic manner), preventing relapse, and providing support – are the keys that physicians can use with their patients.

You and your family can use these strategies too. For example, if you want to have a healthier lifestyle by reducing weight, use the lifestyle-change strategies to help.

### • Set reasonable goals:

Choose a weight that is appropriate and attainable.

### • Raise awareness:

Use a food diary to track your eating habits. Use a pedometer to determine your steps.

### • Confront barriers:

If you have a weakness for chips or snack crackers, don't buy them. If they are not available, you cannot consume them.

### • Manage stress:

Take time for yourself, relax, meditate, go for a walk.

### • Restructure your thoughts:

Come up with your own self-affirmations, such as "I will take a 30 minute walk with my child three times a week" and repeat it often.

### • Prevent relapse:

Learn to expect lapses during certain times, such as holidays or vacations, and develop coping strategies.

### • Provide support:

Be a role model for your friends and family. Enlist your family to eat and exercise together.

To see the expanding list of strategies, refer to Dr. Foreyt's article, "Need for Lifestyle Intervention: How to Begin" in the August 22, 2005 issue of the *American Journal of Cardiology*.

Dr. Foreyt concludes, "By developing a healthy lifestyle, you greatly reduce your risk for Metabolic Syndrome." ❖

# DISCRETIONARY CALORIES: WHAT ARE THEY?

With overweight and obesity becoming more prevalent in the world, some people are saying "Avoid ALL sweet foods and tasty desserts." But Dr. Theresa Nicklas, Professor of Pediatrics at the Children's Nutrition Research Center, Baylor College of Medicine disagrees. She says, "People eat for more than nutrition. Eating is a social occasion. It is a time to talk, listen and build relationships. It is the coming together of people, friends and family. It is a time to remember tradition and culture. Some of our cultural or traditional foods may be a sweet food or a tasty dessert. We need to find a way to incorporate some of our 'personal comfort foods' into our diets with moderation."

Dr. Nicklas was part of the 2005 Dietary Guidelines Advisory Committee,

which coined the term *discretionary calories*. Dr. Nicklas explains, "Simply stated, *discretionary calories* are those calories that can be used 'at your discretion' after basic nutrition needs are met without exceeding energy requirements. It is the difference between your total energy requirement and the energy (calories)

**Total energy requirements are individualized and based on your age, sex and physical activity level. To learn more about your total energy requirements, visit [www.mypyramid.gov](http://www.mypyramid.gov).**

you consume to meet nutrient requirements. By increasing your discretionary calories, you may be

able to have that yummy dessert or personal comfort food."

She suggests we look at discretionary calories instead of focusing on foods to avoid.

There are two ways to increase your discretionary calories. The first is to focus on nutrient dense foods, that is, foods with greater nutritional value for the amount of calories present (i.e. more fruit and vegetables and less fats and oils). By eating nutrient dense foods, you can meet your nutrient needs with fewer calories. This means you will have more calories to use "at your discretion" for other foods. The second way is to increase your physical activity, which also supports a healthy lifestyle for you and your family. Some good ideas are on the next page.

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## DISCRETIONARY CALORIES: WHAT ARE THEY?

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- Buy birthday and holiday presents that promote movement, such as a jump rope, a bicycle, roller skates, a frisbee, a croquet set, or even exergames (video games that encourage physical activity).
- Find activities in your community, such as bike trails, hiking trails, tennis courts, swimming pools, or a skating rink. Your local recreation department can provide additional ideas.
- Plan parties and vacations around movement and play. Instead of a birthday party at the movie theatre, think of some active ways to celebrate, such as a scavenger hunt, a roller blading party, bowling,

or a paintball tournament.

- Volunteer for physical activity events at your child's school.
- Be an exercise buddy for your child.

For additional discussion about the key messages and how to make them practical, refer to Dr. Nicklas' article in the September issue of the *Journal of the American Dietetic Association*, "The 2005 Dietary Guidelines Advisory Committee: Developing a Key Message". ♦

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Send comments or change of address information to Marilyn A. Swanson, Ph.D., R.D. Children's Nutrition Research Center, 1100 Bates Street, Houston, TX 77030-2600.

E-mail: [cnrc@bcm.edu](mailto:cnrc@bcm.edu)  
[www.kidsnutrition.org](http://www.kidsnutrition.org)

### Center Director

Dennis M. Bier, M.D.

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### Editor

Marilyn A. Swanson, Ph.D., R.D.



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