New report projects more than $200 billion in healthcare cost savings from simple diet change

Increasing dairy intake each day could lead to a reduction in chronic disease risk and treatment costs

Boise, ID., January, 2004 – A new report published in the *American Journal of Hypertension* suggests that eating 3 - 4 servings of dairy each day as part of a healthy diet could lead to healthcare cost savings of more than $200 billion over five years, and $26 billion in the first year alone. The report, which takes into account approximately 100 studies spanning two decades, is one of the first to analyze how small diet changes may contribute to significant healthcare cost savings and a healthier population.

The authors evaluated the effects of increasing dietary calcium to recommended levels, mainly through dairy foods. They found strong scientific evidence that dairy foods may play a role in reducing the risk of nine common diseases and conditions, at least one of which affects most Americans, including: obesity, hypertension, type 2 diabetes, coronary artery disease, stroke, nephrolithiasis (kidney stones), osteoporosis, colorectal cancer, and pregnancy-related complications. Treating these common conditions requires about $264 billion in direct healthcare costs annually.

"Small changes will make a big difference. The science suggests that even if a very small percentage – say 15 percent of the population – would increase its daily intake of milk, cheese or yogurt, the healthcare system would begin realizing savings immediately," said co-author David A. McCarron, MD, FACP, Department of Nutrition at the University of California, Davis. "Getting enough dairy each day could benefit all Americans by reducing their risk for several common disorders, reducing healthcare costs and likely lowering their insurance premiums."

Key Findings

The report projects that if Americans eat enough dairy each day as part of a healthy diet, there will be a significant impact on America's public health pocketbook by reducing total healthcare costs for the major diseases and conditions by 10 percent after just one year; 15 percent over five years. Select results include:

- Hypertension: reduce prevalence 40 percent in one year; reduce costs $14 billion in one year, $70 billion over five years;
- Obesity: reduce prevalence 5 percent in one year, 25 percent over five years; reduce costs $2.5 billion in one year, $37.5 billion over five years;
- Type 2 diabetes: reduce prevalence 5 percent in one year, 25 percent over five years; reduce costs $2.5 billion in one year, $37.5 billion over five years; and
- Osteoporosis: reduce fracture risk 20 percent in one year; reduce costs $3.5 billion in one year, $14 billion over five years.

"It's very straightforward: to help prevent chronic diseases, incorporate 3 - 4 servings of nutrient-rich dairy each day as part of a healthy diet and lifestyle," said co-author Robert P. Heaney, MD, FACP, FACN, Osteoporosis Research Center at Creighton University, Omaha.

Approach and Methodology

The authors analyzed the health impact of adequate dietary calcium intake based on published scientific evidence. The findings build on the theory that it is more than the calcium in dairy that provides a nutritional source of disease prevention; it is the full nutritional profile of dairy foods, which includes proteins, multiple minerals, vitamins, carbohydrates and essential fatty acids.

To project risk reduction, the authors used percentages from the referenced studies, and then cut them by 50 percent to be conservative. To project healthcare cost savings, the authors referenced recent data published by public and private health organizations.

About Dairy's Nutritional Properties

Dairy provides a unique package of calcium and protein plus other nutrients essential to health such as phosphorus, potassium, vitamins D, A and B12, riboflavin and niacin. A significant body of scientific research suggests that getting your calcium requirements from dairy foods may help reduce the risk of chronic diseases such as osteoporosis, hypertension and obesity.

According to the USDA, 75 percent of Americans are not meeting calcium recommendations. It's easy to get three servings of dairy a day with the variety of great tasting and convenient milk, cheese and yogurt options available today – all readily available in flavored, lowfat, fat free and lactose free options to meet taste and nutrition needs.

Key Facts & Findings

With 3 - 4 servings of dairy a day, disease risk is lowered, and healthcare costs are reduced.

Disease/Condition	Risk Reduction (percent lowered)	Cost Savings Over Five Years
Hypertension	40 percent immediately	$70 billion
Obesity	25 percent over five years	$37.5 billion
Type 2 diabetes	25 percent over five years	$37.5 billion
Coronary artery disease	10 percent annually	$16.5 billion
Stroke	20 percent annually after three years	$20 billion
Osteoporosis	20 percent per year	$14 billion
Nephrolithiasis (kidney stones)	25 percent over five years	$2.5 billion
Colorectal cancer	5 percent annually after three years	$1 billion
Outcomes of pregnancy	25 percent in year one	$15 billion

Big savings with small changes.

- Total first-year healthcare savings would exceed $26 billion, a 10 percent reduction in costs for the conditions evaluated
- Total five-year cumulative healthcare savings would be approximately $214 billion, greater than a 15 percent reduction in costs
- Only a modest percentage of the adult population, those most at-risk for these diseases, would need to increase dairy intake for the healthcare system to begin realizing these savings

How much *is* $209 billion?

- More than five times the total amount the government spends on homeland security
- More than 200 times the amount the government spends on after-school programs
- Enough to build 5,128 miles of freeway through an urban area -- slightly more than the distance from New York City to Las Vegas and back
- Enough to give every man, woman and child in America nearly $700

Sources:

- McCarron DA, Heaney RP. Estimated healthcare savings associated with adequate dairy food intake. Ame*rican Journal of Hypertension.* 2004; 17:88-97.
- USDA, SCFII, 1996.