Aging with Down syndrome

By Liz Scalise USA TODAY 10/28/10

While Marybeth Solinski, 59, of South Carolina, believes that Down syndrome awareness is important, she has always been partial to the word “Down” when describing her daughter, Laura. “I don’t want to use the word syndrome. It’s a T.V. performance for the ages — and it’s a reminder that for most other people, the term ‘syndrome’ is about to gain an unexpected roman- 

UVB monster

Life Today

Today's puzzles

USA TODAY Snapshots®

Top music downloads

Best Year Ever

Today's puzzles

Page 3D

Sunday's puzzles

USA TODAY Snapshots®

Top music downloads

Best Year Ever

Today's puzzles

Page 3D

Sunday's puzzles

USA TODAY Snapshots®

Top music downloads

Best Year Ever

Today's puzzles

Page 3D

Sunday's puzzles

USA TODAY Snapshots®

Top music downloads

Best Year Ever

Today's puzzles

Page 3D

Sunday's puzzles

USA TODAY Snapshots®

Top music downloads

Best Year Ever

Today's puzzles

Page 3D

Sunday's puzzles

USA TODAY Snapshots®

Top music downloads

Best Year Eve
learn why people with Down syndrome suffer disproportionately from some health problems, such as Alzheimer’s disease, but are spared many others, such as heart attacks, strokes and certain types of cancer.

By studying adults with Down syndrome, researchers hope to find new ways to combat diseases of aging in the larger population as well. (See “Antidementia story,” left, head of the science advisory board of the National Down Syndrome Congress.

People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer. By age 40 to 45, virtually everyone with Down syndrome has high blood pressure and high cholesterol, according to the National Down Syndrome Society.

Significantly, doctors have found a gene that increases the risk of Alzheimer’s, called APP, on the 21st chromosome, Lott says. The gene, called amyloid precursor protein, is activated in the brain to create plaques that lead to the brain disease. Researchers believe that the plaques may also, Lott says, be involved in Alzheimer’s.

Researchers are asking: “Is there anything to combat these diseases? Is there a way to prevent Alzheimer’s—both in Down syndrome as well as those without Down syndrome, Head says.?”

People who inherit mutated copies of the gene are at higher risk for the disease. People who do not inherit the mutations but develop a “dose” of a gene affects the function of an enzyme, which results in fewer plaques and less disease, according to Head, who is director of research at the University of Kentucky.

“People with Down syndrome often have a ‘dose’ of a gene,” Head says. “They do not have the full dose, but they do have a partial dose.”

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

A hypothesis: Why do Down syndrome patients develop early Alzheimer’s?

Adults with Down syndrome appear to develop the brain plaques and tangles characteristic of Alzheimer’s disease very early in life—long before age 30, Lott says. Yet, their brains appear to work and compensate for the damage, Lott says.

“May be the plaques are there but the patients are compensating,” says Lott, who says she is in the middle of recruiting Down syndrome participants.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging is a puzzle that scientists hope to solve by studying Down syndrome patients. Researchers believe that the plaques and tangles found in the brains of people with Down syndrome may be key to understanding how the disease develops.

“People with Down syndrome seem to be the only group in the world who develop these plaques and tangles, and they do so many years before people without Down syndrome,” Lott says.

“Researchers are asking: ‘Is there anything to combat these diseases? Is there a way to prevent Alzheimer’s—both in Down syndrome as well as those without Down syndrome, Head says.?”

People who inherit mutated copies of the gene are at higher risk for the disease. People who do not inherit the mutations but develop a “dose” of a gene affects the function of an enzyme, which results in fewer plaques and less disease, according to Head, who is director of research at the University of Kentucky.

“People with Down syndrome often have a ‘dose’ of a gene,” Head says. “They do not have the full dose, but they do have a partial dose.”

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.

Aging troubles start early

People with Down syndrome tend to age prematurely as they develop conditions such as high blood pressure, high cholesterol, diabetes, heart disease and some types of cancer.

It’s an interesting detective story. People with Down syndrome are unique when it comes to many aspects of aging.