Attitude Over Adversity

Children’s Hospital patient serves as national ambassador

page 10
Welcome to the fall issue of MU Health, a magazine featuring stories about patient care and innovations at University of Missouri Health Care.

Around here, we talk a lot about the power of Yes. That one word embodies our mission to care, deliver, innovate and serve. And we’re not the only ones who believe in Yes.

After Jenny Morgan discovered a tumor in her breast through a self-exam, she made it her mission to educate other women about self-exams and to raise money for local breast cancer charities (page 6). Jenny learned about self-exams while serving in the Navy, and we thank her for continuing to serve others through her advocacy.

If you’re looking for a pediatrician, visit our primary care directory on page 12 for a listing of pediatricians who are accepting new patients at three clinics in Columbia. Also in this issue, you’ll get to know Connor Strope, shown on the cover, who is serving as a Children’s Miracle Network Champion child representing MU Children’s Hospital and the state of Missouri.

Finally, join us in looking back at the history of University Hospital, which celebrated its 60th birthday in September (page 16). The hospital opened on Sept. 16, 1956. Today, MU Health Care includes five hospitals and more than 50 clinics.

As always, please feel free to share your stories or give feedback on our social media sites or at muhealth.org/feedback. I look forward to hearing from you.

Mitch Wasden, EdD
Chief Executive Officer
University of Missouri Health Care

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Connor Strope is an inspiration to doctors and staff at MU Children’s Hospital, and now he’s representing the hospital and state as a Champion Child.

Read more on page 10.

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Four Fitness Tips for Kids
Simple ways children, teens can boost performance
Share your happiness. Our patients inspire us, and sharing your story can inspire others. If you would like to share your story, we’d love to hear from you! Visit muhealth.org/feedback, email social@missouri.edu or send a letter to: MU Health Magazine, Communications, DC028.00, 1020 Hitt St., Columbia, MO 65212.

LETTERS

Doctor draws raves

“Dr. Julia Crim, thank you! You were very kind, gentle, understanding and professional with a very upright, nervous and retired RN in pain. So glad to report success. The pain is almost completely gone. You were great. :)
”

Nancy Little
COLUMBIA, MISSOURI

Exceptional care at Women’s and Children’s Hospital

“I just wanted to thank Dr. Ramachandran and his team for doing such a great job operating on my son. They not only came in on a Friday night and did the surgery, but showed up in the morning to check on him and answer all the questions we had.

“I also want to thank all the nurses in the pediatric unit where we stayed overnight. The night shift and the day shift that took over in the morning, they were all great. They took exceptional care of my son and us and really went above and beyond to make us feel like home.

“I am sorry that I did not write down the names of all the great people who took care of us — from the pre-op where the nurse made us coffee to the pediatric nurses who gave us an extra recliner so my husband could stay with us for the night. They even brought us some crackers and peanut butter because they were worried that we did not have anything to eat. Wonderful team!

“This was our first time in Women’s and Children’s Hospital and there is not one bad thing I can say about it. Thank you!”

Rumen Stoyanov
COLUMBIA, MISSOURI

‘Most caring physician’

“Dr. Lucas Buffaloe became my primary care physician about one year ago. I have had several complex health issues that are still ongoing. Dr. Buffaloe is by far the most caring physician I have ever had. He has taken the time to explain everything to me. Has also answered my email at 8 p.m. and for the things he cannot do, he has sent me to the appropriate doctor. MU Health Care should be proud to have Dr. Buffaloe as a primary care physician.”

Mike Trent
HALLSVILLE, MISSOURI

Pain free after surgery

“Dr. Choma, a spine surgeon at the Missouri Orthopaedic Institute, has my complete trust. He did three surgeries on my back that ended my excruciating pain. I would recommend the institute and Dr. Choma to my family.”

Virginia Ford
COLUMBIA, MISSOURI

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Virginia Ford
COLUMBIA, MISSOURI

‘Winning’ pharmacist

“I am sending in a comment about our relationship with Cody Nolke of Mizzou Pharmacy at University Hospital. We needed some help with the cost of some of our medications. Cody jumped on it. He saved us a bushel of money and he did it in such a congenial fashion that it was a genuine pleasure to deal with him.

“I almost felt bad calling him with a question because I knew how busy he must be. You would never know it, though. He was always cordial, helpful and a real piece of cake to deal with. If he was out when we called, he always got back to us. He’s a winner.”

Charles Cunningham
NEW FRANKLIN, MISSOURI

MU Healthe impresses

“I think the MU Healthe system is wonderful. It allows me quick and pleasant contact with my health care providers. I have nothing but good things to say for this system.”

LaDonna Perkins
COLUMBIA, MISSOURI

To learn more about MU Healthe, visit muhealth.org/muhealthe.
If you’re like more than 50 million Americans, you could be suffering from seasonal allergies. Common fall allergens in Missouri are ragweed pollen, weeds and molds.

“Allergies have a wide impact on our health,” said Christine Franzese, MD, allergist with University of Missouri Health Care and a professor of otolaryngology at the MU School of Medicine. “The problem is that many people don’t take allergies seriously, even though they can greatly affect an individual’s quality of life.”

In addition to the more obvious symptoms such as coughing, sneezing, a runny nose and a sore throat, people suffering from allergies often experience extreme fatigue and disrupted sleep.

“If you don’t treat your allergies, you’re likely going to feel tired and have trouble focusing,” Franzese said. “It’s not uncommon for employees and children to have impaired performance during peak allergy seasons. Illness, such as allergies, not only affects the quantity of work an individual completes, but also the quality of that work. Just because you’re physically present, it doesn’t mean you’re mentally present.”

To combat these productivity problems and improve quality of life, Franzese suggests allergy treatment. Treatment comes in three forms: avoidance, medication and immunotherapy.

**Avoidance**
Avoidance simply means avoiding the allergens that irritate you and cause symptoms.

“There are a number of things you can do to help control seasonal allergies,” Franzese said. “Pollen peaks in the morning, so I recommend delaying your morning run. Molds peak in the evening, so if you’re working outside during this time, try wearing a mask.”

She also suggests replacing your home air filter every three months and removing outerwear and shoes when coming inside from outdoor activities.

**Medication**
If avoidance isn’t enough, the second allergy treatment option is medication. Over-the-counter medications can help relieve symptoms but should be used sparingly.

“A lot of people on antihistamines aren’t consciously aware of some of the negative side effects they have,” Franzese said. “Antihistamines can cause tiredness and confusion.”

Not all over-the-counter medications have negative side effects, though. Franzese said that nasal steroids are probably the best medication available to treat allergies.

“Nasal steroids are a great solution for controlling allergy symptoms and have not been shown to impact work performance,” she said.

**Immunotherapy**
Avoidance and medication can be powerful temporary fixes, but the most effective way to control your allergies is through immunotherapy.

“Immunotherapy changes the body’s immune system and enables it to tolerate allergens,” Franzese said. “Unlike antihistamines, immunotherapy doesn’t affect intellectual performance.”

At the ENT and Allergy Center of Missouri, immunotherapy is offered for people ages 3 and older. Various tests can determine one’s allergies. Based on that information, daily drops or weekly allergy shots are administered to slowly expose your body to these allergens and reduce the severity of your allergic reactions. Although treatment requires a relatively long time commitment of three to five years, Franzese said the outcomes could last for life.

“Our goal is for people to finish immunotherapy and never have to use allergy medication again,” she said.

Call the ENT and Allergy Center of Missouri at 573-817-3000 to schedule an appointment, or visit muhealth.org/allergy to learn more.
Mom on a Mission
Military veteran teaches importance of breast self-exams

On a Thursday night just like any other, Jenny Morgan, mother of two, sat in her living room in Westphalia, Missouri. Cuddled up in a chair, she thumbed through a magazine while her children, ages 2 and 4, slept.

“I wasn’t consciously doing a breast exam,” said Jenny, then 36. “But I was feeling around and felt a little lump. I initially thought it might be a clogged milk duct, but it didn’t hurt like a clogged duct normally would.”

Jenny called her husband, James Morgan, over and asked him to feel it.

“Am I nuts, or do I feel something right there?” she asked.

She wasn’t nuts.

After a preliminary screening near her home in Jefferson City, Jenny received an MRI and biopsy at Ellis Fischel Cancer Center. Less than a week later, she was diagnosed with Stage 2 ductal carcinoma (breast cancer) in January 2014. At approximately 1.5 centimeters wide, the tumor that Jenny discovered was roughly the size of a pea.

“In an instant, my world turned upside down,” she said.

After speaking with experts at Ellis Fischel Cancer Center and weighing her options, Jenny made the difficult decision to undergo a double mastectomy to reduce the risk of the cancer returning. Following the procedure, she underwent five months of chemotherapy at Harry S. Truman Memorial Veterans’ Hospital, a U.S. Department of Veterans Affairs (VA) medical facility in Columbia.

“I loved my doctors at the VA,” Jenny said. “If there were any resources that weren’t available for me at the VA, they sent me to Ellis Fischel where I met wonderful nurses — many of whom I still talk to regularly.”

Dawn Frederick, RN, a breast cancer navigator at Ellis Fischel, is one of those nurses.

“From the moment I met Jenny, I knew that she had spunk,” Dawn said. “She’s one of the most focused, determined women I have cared for in my career as a nurse, and she’s a wonderful ambassador for women’s health.”

“My new life mission is educating women on self-exams. My motto is, ‘A breast self-exam saved my life, and it could save yours, too. Don’t put it off.’”

— Jenny Morgan
Setting the Stage for Lymphedema Education

Researchers use interactive theater to provide education, support to breast cancer survivors

Breast cancer survivors are at risk of developing a condition named lymphedema, and researchers at the MU Sinclair School of Nursing are studying a new approach to educating them about the condition.

Pamela Ostby, PhD, RN, a researcher at the nursing school, said breast cancer-related lymphedema may occur in 40 percent of approximately 3 million breast cancer survivors in the United States. It is a chronic condition that requires lifelong management. Heaviness of the arm, swelling and numbness are commonly the first symptoms of lymphedema.

Study allows survivors to interact and intervene

The current method of teaching patients about lymphedema is with printed information, such as brochures. In a recent survey, Ostby reported that most participants agreed that interacting with others was the best way to provide education and support.

Ostby leads a research study comparing the standard method of printed education materials with a newer approach — interactive theater.

“This is exciting, innovative research by a multidisciplinary team led by the Sinclair School of Nursing, with Mizzou’s departments of family and community medicine and theatre,” said Jane Armer, PhD, RN, professor of nursing and director of nursing research at Ellis Fischel Cancer Center.

Individuals who have been diagnosed with breast cancer-related lymphedema are invited to consider participating in this study.

To learn more, please contact Ostby at 314-255-6677 or lereresearch@missouri.edu.

Teaching the importance of self-exams

Jenny credits the discovery of her tumor to education she received while serving in the United States Navy.

“When I was in the Navy, they passed around a fake breast with seeds in it,” Jenny said. “We were supposed to feel around and find the seeds. That was probably the best training I’ve ever had on self-exams.”

Unlike Jenny, many women do not receive training.

“My new life mission is educating women on self-exams,” Jenny said. “My motto is, ‘A breast self-exam saved my life, and it could save yours, too. Don’t put it off.’ ”

As one way of fulfilling that mission, Jenny hosts an annual event with the help of friends and family. The fundraiser for small, local breast cancer charities is named “Doe’s Night Out — The Breast Party in Town.” Held on the first night of deer hunting season in Loose Creek, Missouri, the party includes not only a dinner and silent auction, but also education. With nurses on hand from Ellis Fischel Cancer Center to answer questions, women perform breast self-exams.

Dawn said she looks forward to helping with Doe’s Night Out each year as a fun way to educate women about the importance of self-exams and raise money for women who could otherwise not afford mammograms.

“As moms, we’re busy taking care of everyone else,” Jenny said. “We often take the back burner ourselves and skip an appointment here and there. Statistically, women my age are not supposed to get breast cancer. I kept delaying my annual OB/GYN visit, and if I hadn’t found my lump through a self-exam, I don’t know where I’d be right now.”

For Jenny, raising her children — daughter Millie is now 4 and son Carter is 6 — is not something she is willing to give up without a fight.

ABOVE LEFT Jenny Morgan learned about breast self-exams in the Navy, and now she is on a mission to educate others.
Delivering Essential Screenings
Mammography van brings clinic to job sites, rural Missouri

It is 11:50 a.m. and Cheryl King is finishing up paperwork at Smithfield’s Farmland Food in Milan, Missouri. She checks the clock on her computer monitor and exhales slowly. Normally she’d be counting down the minutes to her lunch break, but today is different. Today, she is getting a breast cancer screening.

“I’ve lost several friends to breast cancer,” King said. “If you don’t pay attention to your health and stay on top of your doctor’s visits and mammograms, you’re putting yourself at risk. I may be almost 65 years old, but I’m not ready to give it up yet,” she said with a laugh.

Since 1992, MU Health Care’s mobile mammography van — or “mamm van” — has provided life-saving breast screenings to women throughout rural Missouri. King has used the service since it first started visiting her office.

“I used to have mammograms done at a regular doctor’s office,” King said. “They always wanted to do extra tests, which meant I’d have to lose a day of work. The mamm van is great because it comes to me and is so simple and convenient to use.”

Though she is no stranger to MU Health Care’s mobile mammography service, today is the first time King will be getting her screening in the new mammography van, introduced in March 2016. This van is a 38-foot clinic that provides women in rural areas access to the same mammography screening services available at Ellis Fischel Cancer Center, including 3-D mammography. The previous van, which was in service since 2005, only offered 2-D breast screening.

“Early diagnosis is where we have the most impact in cancer,” said Kevin Staveley-O’Carroll, MD, PhD, director of Ellis Fischel Cancer Center. “With 3-D imaging, we can more accurately identify cancers.”

With a private mammography suite and changing room, the van is designed with patient needs in mind. Appointments generally take 30 minutes from check-in to completion, and completed scans are sent to Ellis Fischel.

The new mammography van is fully supported with a pledge of $765,958 from the David B. Lichtenstein Foundation, a private foundation that contributes to charitable organizations in Missouri.

“The mamm van is something that will help so many people on so many levels,” said Davida Layer, chair of the David B. Lichtenstein Foundation. “It’s just something we couldn’t say ‘no’ to supporting.”

According to the American Cancer Society, more than 5,000 women in Missouri are expected to be diagnosed with breast cancer this year.

“Thanks to the foundation’s generosity, we can help detect breast cancer earlier by ensuring that women across the state have access to the latest screening services,” Staveley-O’Carroll said.

Employers, rural physicians, church groups, county health departments and civic clubs interested in scheduling the van can call Ellis Fischel’s cancer screening services at 573-882-8511 or email sinelea@health.missouri.edu.

ABOVE Cheryl King knows the importance of early detection to help save lives, and she enjoys the convenience of the MU Health Care mobile mammography van.
"I’ve lost several friends to breast cancer. If you don’t pay attention to your health and stay on top of your doctor’s visits and mammograms, you’re putting yourself at risk. I may be almost 65 years old, but I’m not ready to give it up yet.” — Cheryl King

Watch a video about MU Health Care’s mobile mammography van and hear from women who have used it. muhealth.org/MammVan

Cancer Center, where they are read by a certified breast imaging radiologist. If follow-up care is needed, the mamm van team contacts the patient to ensure she gets the appropriate care.

The all-female clinical staff aboard the van provides mammograms, clinical breast exams and breast health education to women throughout Missouri. In 2015, 2,940 screenings were performed on women from 49 counties.

That’s good news, according to statistics. Research from the University of Missouri’s Department of Rural Sociology found that women who travel more than 50 miles to see the doctor are 10 percent more likely to be diagnosed with late-stage breast cancer.

“Working on the van is a chance to get close to the patients,” said Diane McGann, a patient services representative and mamm van driver. “It’s a more personal, one-on-one experience.”

As the clock strikes 12:15 p.m., King saves her open computer document and heads out the side doors. She easily spots the bright pink van in the parking lot and takes determined strides toward the small set of stairs on the side of the van.

When the doors open, King is greeted by familiar smiling faces. Less than 30 minutes later, she is back at work and ready to finish out her day, knowing that she'll receive her screening results in no more than 10 days.

“People often ask, ‘Does it hurt?’” McGann said. “I tell them it may be uncomfortable, but in a matter of five minutes, you can save your life.”

BELOW The new mammography van, introduced in March 2016, provides the same screening services available at Ellis Fischel Cancer Center, including 3-D mammography.
Connor Strope has been a champion for MU Children’s Hospital for years. The fun-loving 11-year-old son of Paul and Stacy Strope is a regular at events. He tells his story to thousands of listeners during the annual Missouri Credit Union “Miracles for Kids” radiothon and busts out moves during the MU student-led MizzouThon dance marathon.

Born with osteogenesis imperfecta, or brittle bone disease, and diagnosed with autism, the fourth-grader at Blair Oaks Elementary in Wardsville takes pleasure in the simple things, such as movies, music and family. He is an inspiration to everyone with whom he comes in contact, and that is one of the reasons his unofficial status as a hospital champion is now official.

Connor was chosen to represent MU Children’s Hospital and Missouri as a Children’s Miracle Network Hospitals Champion child for 2016-2017.

Each year, the Champions program designates one Champion child per state, Puerto Rico and the District of Columbia to serve as ambassadors and help educate the public about Children’s Miracle Network Hospitals, its hospital members and the financial need of children’s hospitals.

Connor is the second child from MU Children’s Hospital to be chosen as Missouri’s Champion child. In 2012, Jayla Kemp, of Fulton, Missouri, became the hospital’s first Champion child.

“Connor is a resilient young man, conquering many battles in his life, but he does so with a shining smile that is contagious,” said Kristen Fritschie, Children’s Miracle Network coordinator for MU Children’s Hospital. “He and his family do a fabulous job creating awareness about his story, the care he has received at our hospital and Children’s Miracle Network fundraising. The Children’s Miracle Network directly supports 170 children’s hospitals across the nation.”

A champion is born

Connor was diagnosed with brittle bone disease when he was born on July 19, 2005. Osteogenesis imperfecta is a genetic disorder that can cause weak bones that break easily. It can be treated through surgery, physical therapy and medications that strengthen bones. Connor broke his first bone two months before his first birthday.

“It was extremely hard when he was a baby,” said Stacy Strope, Connor’s mom. “We were first-time parents, so that alone is scary. Then to have a baby who could fracture a bone if he sneezed added a lot of stress and worry to the situation. We had family and friends who didn’t want to hold Connor because they were afraid they would hurt him.”

Connor began seeing Daniel Hoernschemeyer, MD, a pediatric orthopaedic surgeon at University of Missouri Health Care, when he was 3 months old. Dr. Dan, as Connor calls him, has performed all of Connor’s surgeries.

“Connor’s prognosis is good, and his life expectancy is full,” Hoernschemeyer said. “I expect him to be an active adult. Connor is a very active kid, and our goal is to keep him physically active. By doing so we are helping to increase his bone density and helping his cardiovascular fitness and weight control.”

“Connor is a great champion. He accepts his disabilities without question, and he handles every situation with a smile.”

— LeAnn Reeder
MU Children’s Hospital Child Life Specialist
In addition to surgery, Connor has received medication treatments since he was 16 months old. These infusions used to take three days (six to seven hours per day) every three months. Now Connor’s treatment takes just two to three hours every six months.

Stacy said she considers Hoernschemeyer and the staff at the MU Children’s Hospital procedure suite as “part of our family.”

LeAnn Reeder, a child life specialist at MU Children’s Hospital, said Connor is a pleasure and she looks forward to his visits.

“Connor is a great champion,” Reeder said. “He accepts his disabilities without question, and he handles every situation with a smile. He represents strength and attitude over adversity and comes across as a very happy young man.”

When Connor is at home, the only reminder of his disease is his parents’ occasional reminders to “be careful” while he’s wrestling with his sister, Mallory. Connor loves to watch movies, listen to music and show off his “moves.”

Although Connor uses a wheelchair when at school, at home he scoots around on his hands and bottom. He loves to spin on his back like a break dancer to release energy and unwind.

“Connor didn’t start rolling over until after his first treatment at 16 months old,” Stacy said. “I’m not sure exactly when it started, but he would roll in a circle slowly to release energy. From that, it got faster and faster.”

Spinning is now part of his daily routine, just like running is for most children.

“People probably think we are crazy to let him do it, but he knows his limits,” Stacy said.

As the state’s Champion Child, Connor will have many opportunities to be an ambassador locally and nationally. He and his family will travel with the other Champion children to events in Florida, as well as visit with congressional representatives in Washington, D.C.

From ear infections and middle-of-the-night fevers to immunizations, it is important that you can always take your child to a physician you can trust. Our team of pediatricians helps answer your questions, ease worries and make certain that your child always gets the best health care possible.

PEDIATRICIAN FUN FACT:
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Four Ways to Love Your Heart

Our experts weigh in on the benefits of four steps you can take to improve your cardiovascular health.

"For all of us, walking is a good health habit to establish for life. The hardest part is just getting started. Many times, if you can just get up and get started, people find that they go a little farther than they thought." — William Fay, MD

**Take a walk – often.**

“For all of us, walking is a good health habit to establish for life,” said William Fay, MD, a cardiologist at MU Health Care.

“The hardest part is just getting started,” said Fay, who serves as chair of cardiovascular medicine at the MU School of Medicine.

“Many times, if you can just get up and get started, people find that they go a little farther than they thought. A pedometer is a fun way to track your progress and can be a nice gift.”

While the American Heart Association recommends 10,000 steps per day for most individuals, Fay said that any activity is better than no activity.

“For some of my patients with lower capacity, I talk to them about 5,000 steps a day,” he said. “If walking isn’t going to happen, think of other ways you can exercise, even arm exercises.”

**Tap those toes!**

Previous research has shown that sitting for an extended period of time at a computer reduces blood flow to the legs, which may contribute to the development of cardiovascular disease. MU researchers recently found in a study that fidgeting while sitting can protect the arteries in legs and potentially help prevent arterial disease.

“We wanted to know whether a small amount of leg fidgeting could prevent a decline in leg vascular function caused by prolonged sitting,” said Jaume Padilla, PhD, an assistant professor of nutrition and exercise physiology at the MU School of Medicine.

“While we expected fidgeting to increase blood flow to the lower limbs, we were quite surprised to find this would be sufficient to prevent a decline in arterial function.”

Researchers caution that fidgeting is not a substitute for walking and exercise, which produce more overall cardiovascular benefits.

“You should attempt to break up sitting time as much as possible by standing or walking,” Padilla said. “But if you’re stuck in a situation in which walking just isn’t an option, fidgeting can be a good alternative. Any movement is better than no movement.”


**Know your numbers.**

Do you have high or low cholesterol? Do you have a family history of heart disease? What is your blood pressure? Are you diabetic or do you have high blood sugar? Are you overweight?

You may have heard the saying, "know your numbers." Fay said that knowing what your current status is in these areas can help you and your doctor determine if you are at risk for heart disease or need to take action. For example, if your cholesterol or blood pressure is high, your doctor may recommend diet changes or inexpensive medication, which can help prevent or delay the onset of symptoms of heart disease.
Do not smoke.

OK, OK, you've heard it a million times — smoking is bad for you. Although smoking is often tied to lung cancer, our experts quickly point out that smoking can also damage one's cardiovascular system.

"Smoking over time is one of the major risk factors for heart attack, and it is a completely preventable risk factor," said Mary Dohrmann, MD. "My message is to never start — it's the best thing you never do. But once a person who smokes develops heart disease, it is imperative that they stop."

As medical director of cardiac rehabilitation at MU Health Care's Fit for Life program, Dohrmann guides patients recovering from heart attacks and other heart conditions through exercise programs. She recommends talking to your doctor about available resources if you are ready to quit smoking. Having a supportive network of family and friends is also important, she said. Make sure your loved ones understand that you are undertaking a big lifestyle change.

"I also emphasize to my patients that not exercising is as bad as smoking," Dohrmann said.

Breakfast Bars

Whether you're getting children ready for school in the morning or just want a healthy breakfast you can grab on the go, Ashley Ritzo, RD, recommends breakfast bars that are full of fiber and protein. Ritzo, a clinical dietitian at MU Health Care, offers this modified recipe from the Happy Healthy Mamma Blog.

1 can (15 ounces) chickpeas, drained and rinsed
1/2 cup dates
1/2 cup whole almonds
1 cup rolled oats
1/2 cup pumpkin puree
1/4 cup maple syrup
2 tablespoons coconut oil
1/2 teaspoon baking soda
2 teaspoons baking powder
2 teaspoons vanilla
1 1/2 teaspoons cinnamon

Toppings:
1/4 cup rolled oats
1/4 cup pumpkin seeds (pepitas)

1. Soak ½ cup almonds in water for about 1 hour to soften and make them easier to blend.
2. Preheat the oven to 350 degrees. Line an 8X8-inch pan with foil and coat the foil with nonstick spray. Wrap the edges of the foil over the side of the pan.
3. Put soaked almonds in food processor or blender first and process until finely ground. Next, add all other ingredients and blend until smooth.
4. Scoop blended mixture into the prepared baking pan and add toppings. Bake for 15 minutes.
5. The foil should come right out of the pan and bars can be stored wrapped in the foil in the refrigerator for up to 3 days.
Happy 60th Birthday, University Hospital!

In 1956, Charlton Heston graced the silver screen as Moses in “The Ten Commandments,” Elvis Presley released his first hit, “Heartbreak Hotel,” and University Hospital opened its doors in Columbia, Missouri.

Sixty years later, University of Missouri Health Care has expanded to include five hospitals and more than 50 clinics. Today, MU Health Care includes University Hospital, Ellis Fischel Cancer Center, Women’s and Children’s Hospital, the Missouri Orthopaedic Institute and the Missouri Psychiatric Center, all based in Columbia.

Hugh E. Stephenson Jr., MD
(1922-2012)

The University of Missouri Medical Center, as it was known at the time, was built in mid-Missouri in large part because of one young surgeon. Hugh E. Stephenson Jr., MD, helped lead efforts to guide Missouri through the debate over where to build the new medical center. Although powerful opponents lobbied for building in a bigger city, Stephenson and others promoted the rural city of Columbia because it was home to the University of Missouri, offering tremendous opportunities for collaboration across campus.

September 16, 1956

University Hospital opens as 49 patients from Noyes Hospital and Parker Memorial Hospital are transported to the new facility. Noyes and Parker were the first hospitals associated with the University of Missouri in Columbia. The new, seven-floor hospital included 441 beds and 28 bassinets.
Looking Back
Take a look back at the first 60 years. Here’s to many more!

SEPTEMBER 16, 1956
Hugh E. Stephenson Jr., MD, leads the first surgery performed at University Hospital.

SEPTEMBER 17, 1956
The first baby is born at University Hospital.

JUNE 1968
University Hospital’s ambulance service begins.

1982
University Hospital’s trauma center is established. Today, the Frank L. Mitchell Jr., MD, Trauma Center continues to provide lifesaving care as the only Level I trauma center in mid-Missouri.

NOVEMBER 24, 1982
The Staff for Life Helicopter Service begins.

1999
University of Missouri Health Care is formed when Columbia Regional Hospital merges with University Hospital, Children’s Hospital and Ellis Fischel Cancer Center.

JULY 1, 2009
The Missouri Psychiatric Center opens in the facility previously occupied by the state’s Mid-Missouri Mental Health Center.

JUNE 1, 2010
James Stannard, MD, leads the first surgery at the new Missouri Orthopaedic Institute. The facility is central Missouri’s largest freestanding orthopaedic center.

SEPTEMBER 10, 2010
The Children’s Hospital services at University Hospital are moved into Columbia Regional Hospital, and the facility is renamed the MU Women’s and Children’s Hospital.

MARCH 2013
University Hospital is expanded, opening a new patient care tower. Ellis Fischel Cancer Center moves from Business Loop to the patient care tower, bringing outpatient and inpatient cancer care under one roof.

AUGUST 2016
A record number of babies are born at MU Women’s and Children’s Hospital: 216 babies in one month.
It wasn’t uncommon, years ago, for children to play multiple sports and not settle on one until high school, if at all. These kids were all-around good athletes because they needed a range of skills to be successful.

Today, more children are focusing on one sport at a younger age and playing it exclusively. This means they have specialized skills but often lack general fitness, endurance and strength.

“A child might be able to dribble a soccer ball well, but he can’t do simple movements such as running, jumping and cutting that are needed to be successful,” said Garrett Buschjost, head trainer at the MU Human Performance Institute in Columbia. “Too many children are under-generalized and overspecialized.”

If a child who has only played one sport wants to try another, he or she might not have the skills to be successful. Although specific training regimens are necessary to achieve the best results, Buschjost offers these basic tips for young people to increase their overall fitness level.

1. Be active

The Centers for Disease Control and Prevention (CDC) recommends children and teens be physically active for 60 minutes or more each day. This should include aerobic activity, muscle-strengthening activities and bone-strengthening activities.

Buschjost said families should develop active lifestyles that include daily walking or running. This will help keep children away from screens (TV, computer, etc.) and build a healthy habit that will serve them well — on the playing field and in life.

2. Build strength

Whether children are active in sports or not, simple weight training can increase fitness and overall health. This falls under the muscle-strengthening activities recommended by the CDC.

Buschjost said the best way for children to increase strength is through body weight exercises. Functional movements such as squats, lunges, push-ups and pull-ups are most effective and help build muscles needed in everyday life as well as in sports. Young athletes can progress to resistance-based training after they master each movement, Buschjost said.

3. Eat well

This tip applies to everyone — children and adults — but it’s often easier said than done. However, proper nutrition is essential to athletic performance, especially for children whose bodies are growing.

Buschjost said children should limit junk food, soda and sports drinks and think FASTER:
- Fill up on fruits and vegetables.
- Always hydrate — water is best.
- Start with breakfast.
- Think lean protein.
- Eat often.
- Rest and recovery.

4. Get sleep

The R in FASTER emphasizes the importance of rest and recovery, and a big part of that is getting a good night’s sleep. Muscles need time to recover after exercise, and that’s especially true for children.

One of the biggest obstacles to sleep is technology. Many adolescents “go to bed” only to spend an hour or more texting with friends or watching videos. This not only keeps them up while they’re using the device, but it can also interrupt their sleep cycle.

Buschjost said well-meaning parents might schedule more games or practice because they’re trying to help their children improve. Sometimes, he said, the best option is to forgo that extra workload and instead let the kid get some shut eye.

Buschjost advises children and parents to focus on overall health and fitness and to remember that specialization can lead to overuse injuries and uneven skill development. The best athletes are those who focus on the fundamentals before specializing, he said.

Bill Meister of Columbia said his children, Ryan and Haley, have shown healthier behaviors after they started training at the MU Human Performance Institute.

“They are much more positive and confident in themselves, not only in sports, but also in school and socially,” Meister said. “I think both Ryan and Haley will have great habits throughout life by starting this early and hopefully will continue to exercise regularly throughout life.”
Building on the Basics

There are several exercises that children can do to increase their performance. Andy Ciolino, 11, and Haley Meister, 14, two clients of MU Human Performance Institute, demonstrate variations of these common exercises. You can add weights to increase difficulty after the bodyweight exercise is mastered.

**SQUATS**

Sit back, squat down, drive knees out and drive through the floor with your heels.

**LUNGES**

Step out, squat straight down and drive back. Keep your knee over your ankle.

**GLUTE HAM RAISES**

Fall as slowly as you can and squeeze your glutes tight during the entire movement.

**BENT-OVER ROW**

Keep back flat and pinch your shoulder blades together like you are putting your shoulder blades in your back pocket.

**PULL-UP**

Grip bar hard and put your shoulder blades in your back pocket.

**PUSH-UPS**

Separate from the ground with your hands and then push up keeping your abs and glutes tight.
Did your child’s back-to-school list include an eye exam? It should have.

The American Optometry Association estimates that 1 in 4 children has a vision-related condition. "Poor vision directly affects learning," said Raneat Cohen, OD, optometrist at MU Health Care. “Children become frustrated when they can’t see clearly and their learning and attention span can suffer.”

Common childhood eye conditions include eye turn, lazy eye, tearing problems and poor vision. When caught early, many of these issues can be corrected or effectively treated. “Most of the time, the solution is easy,” said Kelli Shaon, OD, optometrist at MU Health Care. “If we can intervene at a young age, we can often achieve amazing results.”

Optometrists recommend comprehensive vision screenings for children as young as 6 months old. Studies show that 60 percent of students identified as problem learners have undetected vision troubles.

The best way to identify and diagnose these is through a comprehensive eye exam. “Many times parents don’t come in until they see a problem,” Shaon said. “Unfortunately, vision issues are often hidden so there’s no way to diagnose them without a screening.”

The University of Missouri’s Mason Eye Institute provides expert care tailored to children. Pediatric vision exams are offered at the University Eye Institute East offices, conveniently
To schedule an exam at University Eye Institute East, please call 573-882-8920.

Located across the street from MU Women’s and Children’s Hospital in Columbia.

Kid-friendly offices complete with multiple TV screens and a play area help decrease the stress of a pediatric eye exam. “Parents with young children are often nervous about eye exams,” Cohen said. “They worry about, ‘How is my child going to sit still?’ and ‘What if the doctor can’t get everything she needs to see?’”

At University Eye Institute East, an energetic staff works together to make pediatric patients feel comfortable. Children can even watch cartoons while getting their eyes examined.

Comprehensive pediatric screenings typically take 30 to 45 minutes and include a case history discussion, vision testing, eye alignment check, eye health evaluation and, if needed, a prescription for eyewear.

If your child does need glasses, more than 100 sets of children’s frames are available in Mizzou Optical, conveniently located within Eye Institute East. “Making sure your child’s glasses fit properly is essential,” Shaon said. “We’re the best in the area at fitting children and meeting their unique needs.”

Cohen said that she sees children at least once per week whose lives have been positively changed because of issues discovered during comprehensive eye exams. “Parents are always amazed at the quick results,” she said. “They’ll come to me and say they have a whole new child — they’re doing better in school, playing with others and making eye contact.”

Not only can eye exams lead to improved vision, they can also uncover maladies throughout the body. “It’s not uncommon for us to find other issues based on a vision exam,” Shaon said. “Nearly one-third of my day or more is spent working on screening for issues beyond the vision exam.”

One such screening led to the discovery of a serious condition named hydrocephalus, or fluid on a person’s brain. “During a routine dilation exam, I was able to look in my patient’s eyes and I found she had swollen optic nerves in both eyes,” Shaon said. “Swollen optic nerves can be indicative of fluid build-up around the brain, infection or inflammation. Because our clinics are a part of MU Health Care, we easily referred the child to the correct specialist.”

At University Eye Institute East, optometrists are committed to giving children their best chance to succeed. “As parents, we worry about every facet of our children’s lives,” Cohen said. “Let us help take that worry away from you when it comes to their vision. Let us figure it out.”

ABOVE Raneat Cohen, OD, optometrist at MU Health Care, conducts comprehensive eye exams at Mason Eye Institute East.
On any given day, clinics at the Missouri Orthopaedic Institute are bustling with patients seeking expertise and care for their bone and joint issues. Soon, the health professionals who treat patients will work alongside researchers in an innovative laboratory on the building’s fourth floor to develop the newest generation in treatments.

“It truly will be a one-of-a-kind laboratory right in the heart of the clinical orthopaedic center,” said James Cook, PhD, DVM, director of the Orthopaedic Research Division at MU.

In May, the Thompson Foundation, created by William and Nancy Thompson, pledged $3 million to the University of Missouri School of Medicine to create the Thompson Laboratory for Regenerative Orthopaedics.

“Since our days at Mizzou, Nancy and I have been fortunate to meet some of the exceptional academic, medical and research talent within the university,” said Bill Thompson. “When Drs. Hal Williamson, Jim Stannard and Jimi Cook told us of their exciting plans for future discovery and innovative treatment in regenerative orthopedics, we jumped at the chance to invest in their cutting-edge work. It has the potential to benefit the lives of countless people, young and old.”

Cook and James Stannard, MD, medical director of the Missouri Orthopaedic Institute, conducted recent research into regenerative orthopaedics. Their discoveries led to the development of a better method to store donor tissue, and improved procedures for repairing torn knee ligaments and other joint injuries. Cook and Stannard lead the Mizzou BioJoint Center at the institute — the first and only center of its kind in the nation.

“This amazing gift will create a center of discovery, translational and transformative research, and clinical applications,” Cook said. “It will set Mizzou apart in this burgeoning area of medicine. Because the Thompsons have provided this incredibly unique opportunity for us to create a world-class laboratory right in the heart of our clinical orthopedic center, we will be able to more efficiently and effectively improve health care.”

The Thompsons’ hope for this gift is to boost the scope and quality of care at the Missouri Orthopaedic Institute. Stannard believes it will happen.

“This gift is a game-changer,” Stannard said. “We can go from very good to great. That’s an elite jump that only a very few can make.”

The Thompsons are not new to supporting Mizzou’s efforts to improve the health of individuals in Missouri and beyond. In 2005, their $8.5 million gift helped establish the Thompson Center for Autism and Neurodevelopmental Disorders, now a national leader in the diagnosis and treatment of autism spectrum disorders.
DON’T LET HIP AND KNEE PAIN HOLD YOU BACK
Learn how our physicians can help get you back to a healthy, active lifestyle.

For more information, visit MUHEALTH.ORG/MOI
or call (573) 882-BONE
The University of Missouri School of Medicine celebrated the ‘topping off’ of its Patient-Centered Care Learning Center on July 29, marking the completion of the $42.5 million medical education building’s vertical construction. At the event, MU students, faculty and staff signed the ceremonial last beam to be placed atop the building before it was hoisted into place by a crane.

The new education building represents an expansion of the MU School of Medicine. The expansion was made possible through an innovative partnership with the University of Missouri, the MU School of Medicine, CoxHealth, Mercy Springfield and the state of Missouri. The initiative is designed to address a critical shortage of doctors in the state and nation by expanding the class size of the MU School of Medicine and adding an MU clinical campus in Springfield.

“The opening of the Springfield Clinical Campus in June was the first major milestone in our endeavor to expand our medical school,” said Patrick Delafontaine, MD, Hugh E. and Sarah D. Stephenson Dean of the MU School of Medicine. “Today, we celebrate and say thank you to those who helped us achieve yet another major milestone: the ‘topping off’ of our new Patient-Centered Care Learning Center.”

The expansion will allow the medical school to increase its class size each year from 104 to 128 students, beginning in August 2017.

“When the Patient-Centered Care Learning Center opens in August 2017, we will be increasing MU’s medical student class by more than 30 percent,” said Linda Headrick, MD, senior associate dean for education at the MU School of Medicine. “This building, and our Springfield clinical campus, will allow more students the opportunity to remain in our state or come to our state to study and practice medicine.”

The 97,088-square-foot building, uniquely designed to meet the needs of students, will house classrooms, an anatomy lab, a simulation center, patient-based learning labs, and education services for medical students.

TOP RIGHT The ceremonial last beam is lifted to the top of the Patient-Centered Care Learning Center after a dedication ceremony in July.

BOTTOM RIGHT Patrick Delafontaine, MD, Dean of the MU School of Medicine, signs the beam before it’s placed atop the building.

Learn more about the Patient-Centered Care Learning Center at medicine.missouri.edu/morephysicians/
Clinic Serves Soldiers Battling Brain Injuries

At a clinic on the Fort Leonard Wood army base in Missouri, Eric Hart, PsyD, serves those who serve in the United States Army. An MU health psychologist who specializes in rehabilitation and neuropsychology, Hart leads a clinic for military personnel with brain injuries.

“Research supports that early identification of a mild brain injury can drastically influence the course of recovery for a survivor,” Hart said. “By offering some level of psychoeducation early on, health professionals can begin the lengthy discussion about what the injury is, what it is not, and identify what limitations to daily functions may exist.”

The clinic serves soldiers who experienced traumatic brain injury during basic training, soldiers injured after multiple deployments and retired soldiers who were injured.

Traumatic brain injury is brain dysfunction caused by an outside force — often a violent blow to the head or from shearing and stretching of tissue causing displacement of the brain due to movement. Post-traumatic Stress Disorder (PTSD) is also an injury affiliated with members of the military. Working with the Fort Leonard Wood staff, Hart’s team hopes to learn more about co-occurring psychiatric conditions that could affect the day-to-day social skills of military men and women.

These injuries are certainly not a new trend. However, the ability to assess and determine what causes injury or trauma and how it is affecting brain integrity is a growing area of study. Clinical researchers are looking at what repeated exposure to improvised explosive devices and other explosions are having over time to the brain function of those in combat.

Hart recommends that traumatic brain injury survivors receive care from multiple providers for best treatment. Depending on an individual’s needs, this team could include any combination of providers such as an occupational therapist, physical therapist, speech therapist, nurse, case manager, general psychologist, rehabilitation psychologist or neuropsychologist.

“I’m proud that MU’s clinic offers state-of-the-art neuropsychological assessments,” Hart said. “We’re able to make recommendations to help survivors enhance their quality of life and return to their work-related duties.”
For Joanne Witting, 76, visiting the West Broadway Walmart in Columbia will never be the same after her visit on May 11. On that day, she experienced a heart attack. Witting’s heart attack sent bystanders and employees into a flurry of action. A fellow shopper, Bob Crockett, raced to get help. He caught the attention of Jason Puryear, an employee of Nauser Beverage, who sought help from Walmart employees. Christopher Buckner was the first employee to arrive in the area and called 911. Walmart manager Dawn Moritz began CPR, and Mason Miner continued chest compressions and followed instructions given by the 911 dispatcher. Other employees quickly found more ways to help. Justin Basham helped assess Witting’s vital signs and then began contacting family members listed in her phone. Jessica Shinn ran for supplies. Pharmacist Noah Alexander checked Witting’s belongings for medication or other hints that might help employees determine what was happening. Diane Phillips organized a human shield to protect Witting and allow EMS crews quicker access. Michael Savage waited at the front door and escorted the Columbia Fire Department responders and MU Health Care paramedics to the right spot.

“For that many people to be engaged in CPR and moving a patient out of the facility is not something you normally see,” said Daryn Stark, ambulance supervisor at University Hospital. “They made it look flawless and seamless.”

The cohesive response by community members and employees gave Witting the best chance for a good outcome, and their actions were honored in a ceremony at the store on June 27, where 20 people received community hero recognition from MU Health Care for their roles in helping save Witting. Coincidentally, Witting worked for MU Health Care for 20 years, and Crockett also previously worked at MU Health Care.

In addition to the honorees previously mentioned, 10 Walmart employees were honored for acting as a shield to offer Witting privacy. Those employees are Mariah Bergemann, Robert Coepp, Lois Marston, Ron Medland, Jenny Nichols, James Rowland, Bobbi Russow, David Schroeder, Taylor Thoenen and Stacy Wallingford. Daniel Lopez, EMT, was the lead paramedic with the ambulance that responded to Witting’s emergency. He was impressed at the number of people who chose to help.

“Without their action, I can almost guarantee the outcome would have been drastically different,” Lopez said. “They weren’t required to take action, but they chose to, and because of that, a life was saved.”

A coordinated response by community members and Walmart employees gave Witting the best chance for a good outcome.

ABOVE Joanne Witting, right, expresses her appreciation during a Community Hero recognition ceremony in June at the West Broadway Walmart in Columbia. A coordinated response by community members, Walmart employees and others helped give Witting the best chance for a good outcome after she had a heart attack in the store.
Protein in Breast Milk Reduces Infection Risk in Premature Infants

Full-term babies receive natural protection from their mothers that helps them fight off dangerous infections. However, babies born prematurely lack protective intestinal bacteria and often are unable to be nursed, causing their infection-fighting capabilities to be underdeveloped. Researchers at MU’s School of Medicine and Sinclair School of Nursing found that a manufactured form of lactoferrin, a naturally occurring protein in breast milk, can help protect premature infants from a type of staph infection.

“Babies born with low levels of protective intestinal bacteria are at an increased risk of devastating and sometimes deadly infections,” said Michael Sherman, MD, professor emeritus of child health at the School of Medicine and lead author of the study. “Our study found that giving very-low-birth-weight premature infants a manufactured form of lactoferrin can virtually eliminate the germ that causes a staph infection known as staphylococcus epidermidis.”

The researchers studied the immune systems of 120 premature infants in the neonatal intensive care units at MU Women’s and Children’s Hospital and the University of Southern California Children’s Hospital Los Angeles between July 2009 and January 2012. Infants in the trial weighed between 1 pound, 10 ounces, and 3 pounds, 4 ounces, at birth. Sixty of the infants received lactoferrin via a feeding tube twice a day for 28 days to simulate receiving mother’s milk while nursing. The researchers found that germs responsible for the colonization of staph infection were virtually eliminated in the newborns who received lactoferrin.

“These germs are the most common cause of in-hospital bloodstream infections in premature babies, causing up to 50 percent of infections,” Sherman said. “As physicians, we’ve had limited knowledge of how lactoferrin affects the development of protective intestinal bacteria. Our study shows that it can modify germs in the bowel of infants, and those germs can protect premature babies from staph infections.”

As part of the study, lactoferrin was provided to the patients at no cost. According to Sherman, lactoferrin can cost an estimated $25 to $500 per dose, though an infection can extend an infant’s hospital stay by 10 to 14 days at a cost of $40,000 to $56,000.

Though it is too early to recommend lactoferrin as a standard treatment protocol in neonatal ICUs across the country, the researchers say more research could shed light on its role in preventing infections.

Mizzou Urgent Care Expands Hours

To make getting health care more convenient, Mizzou Urgent Care is now open from 8 a.m. to 8 p.m. seven days a week (excluding holidays).

If you are facing an immediate, but non-life-threatening, health care issue, the physicians at Mizzou Urgent Care can help. Some reasons to visit urgent care include:
- ear infections with pain or fever
- sore or strep throat
- hives and rashes
- minor cuts and burns

551 E. Southampton Dr, inside South Providence Medical Park
573-882-1662
muhealth.org/urgentcare
MU Health Care’s orthopaedics and urology departments are rated as 2016-2017 high performing specialties by U.S. News and World Report.

MUHEALTH.ORG