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What to Expect from a Colonoscopy

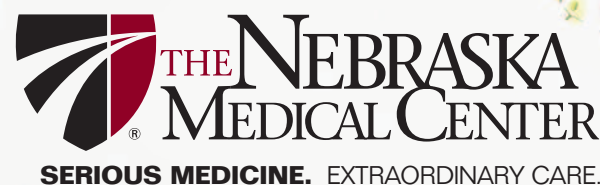
Many medical experts agree that this highly effective cancer screening tool has gotten a bad rap. Here's what to expect and how to prepare for a colonoscopy. See story on page 2.

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What to Expect from a Colonoscopy

TAKE THE NEXT STEP TO PREVENT COLORECTAL CANCER.

To learn more about colorectal cancer, visit us at www.NebraskaMed.com/colorectal.

Colonoscopy has gotten a bad rap. It's one of the most effective cancer screening tools available, but it's used by less than 50 percent of the eligible population.

"Many people delay scheduling a colonoscopy because they fear it's unpleasant or uncomfortable, when that's really not the case at all," says Grant Hutchins, MD, gastroenterologist at The Nebraska Medical Center. "The procedure takes only about 20 to 30 minutes to perform and the patient

is sedated, so they usually feel or remember practically nothing."

The most uncomfortable part of the experience is the preparation. You must drink only clear liquids the day before and fast overnight. You will also need to drink a special fluid the evening and night before that helps clean out the colon and will cause diarrhea.

Colonoscopy is performed by using a flexible, slender, lighted tube that is attached to a video camera and is

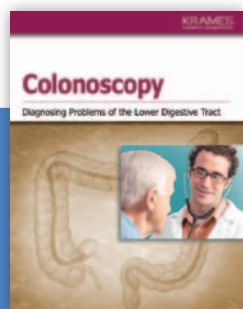
used to examine your colon. If any polyps are found, your doctor may remove them immediately or take a biopsy for analysis. Air is also injected into the colon during the procedure to expand the colon, which gives doctors a better view. As a result, the patient may experience bloating and gas for an hour or two afterward. The sedative takes six to eight hours to wear off, so you are advised not to drive and to take it easy the rest of the day.

The procedure is extremely effective in detecting small polyps and tumors, says Dr. Hutchins. It is recommended once every 10 years beginning at age 50 for both men and women, with a few exceptions. If you have a family history of colorectal cancer, you should have your first screening performed 10 years before the age your first-degree relative was diagnosed with colon cancer. African-Americans, who

have a higher incidence of colon polyps and perhaps cancer, should begin screening at age 40, says Dr. Hutchins.

Nearly all colon cancers develop from polyps—small, noncancerous clumps of cells that usually produce few or no symptoms. While most people begin developing polyps at age 50, many of these will not be cancerous. Over time, however, some of these polyps can become cancerous. Regular screenings can help detect these polyps before they become cancerous. Possible signs and symptoms of colon cancer include a change in bowel habits, blood in the stool, persistent cramping, gas or abdominal pain.

"Colon polyps found in the earliest stages are completely removable," says Dr. Hutchins. For best results, procedures should be performed by a gastroenterologist or other trained endoscopic specialist, he adds. ■



REQUEST A BROCHURE

Our FREE brochure explains the colonoscopy procedure. To order a copy, please call **800-922-0000**. Supplies are limited, so call today!

Hot Chemo: A Powerful New Weapon Against Cancer

Surgeons at The Nebraska Medical Center have added a new weapon to their battle against cancer—heat. Heat by itself kills cancer cells. A temperature of 108 degrees or more, combined with chemotherapy, amplifies chemo's effectiveness and adds another mechanism to induce cancer cell death. This innovative therapy is known as hyperthermic intraperitoneal chemotherapy (HIPEC), also called hot chemo, and it is used primarily for treating cancers that have metastasized in the abdominal cavity.

Hot chemo involves instilling a heated solution of chemotherapy in the abdominal cavity. The hot chemo helps prevent early recurrence of the disease by killing any remaining microscopic cells or small nodules that could not be removed during surgical resection.

This approach is best suited for cancers that originate or have metastasized to the abdominal (peritoneal) cavity, notes Jason Foster, MD, surgical oncologist at The Nebraska Medical Center. This includes cancers of the appendix, colon and ovaries as well as malignant peritoneal mesothelioma. Dr. Foster, who has received specialized training in this procedure, is one of a very small number of surgical oncologists in the United States practicing this technique.

Hot chemo complements traditional chemotherapy used for patients with metastatic cancer and offers several benefits. In addition to heat, the hot solution is

delivered directly to the site of the tumor and bathes the entire peritoneal cavity with a high concentration of chemotherapy that is four to five times higher than what is possible with traditional intravenous (IV) chemotherapy. IV chemotherapy must be delivered at less concentrated doses to avoid toxicity to vital organs, like the liver and kidneys.

Clinical studies have confirmed the effectiveness of hot chemo. The median survival for high-grade appendix tumors has been extended by two- to three-fold, and it is the only treatment that provides a cure. It is also the only effective therapy for patients with malignant peritoneal mesothelioma, which now boasts five-year survival rates of 50 to 70 percent compared with less than one year with standard chemotherapy.

"According to a recent report in the *Journal of Clinical Oncology*, it has increased the five-year survival for colorectal patients with peritoneal metastasis by 30 to 60 percent," says Dr. Foster. "We extend survival, doubling and tripling the median survival time even for patients who are not cured."

"One of the keys to success," says Dr. Foster, "is getting to patients early in their diagnosis so we have the opportunity to potentially eradicate their disease. Studies show that when minimal cancer remains after surgical removal, long-term survival typically doubles and triples." ■



Upcoming Webinars

Female Sexual Dysfunction

Tuesday, Oct. 11, 6:30 to 8:30 p.m.

Male Sexual Dysfunction

Tuesday, Oct. 18, 6:30 to 8:30 p.m.

Registration is confidential and required for these webinars. Please check our Facebook page for more registration information: www.facebook.com/NebraskaMed.

Your Online Source for Health Info

For the latest information and news, support groups, events, patient stories and perspectives from our physicians, check out these online resources:

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www.NebraskaMed.com

<http://blogs.NebraskaMed.com>



Watch Our Video

To learn more about the hot chemo process, visit www.youtube.com/NebraskaMedCenter.

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- Physician referrals
- Class registration

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WOMEN'S HEALTH & WELLNESS CONFERENCE

Brain Power: A Healthy Brain at Any Age

This day-long conference will cover common conditions associated with the brain, such as headaches, migraines, ADHD, Alzheimer's and brain injury, as well as important strategies to help you maintain a healthy brain, such as nutrition and exercise.

Friday, Oct. 7
8 a.m. to 4 p.m.

Mid-American Center
One Arena Way, Council Bluffs, Iowa
Includes lunch and continental breakfast

General public: \$49
Nurses: \$79 (5 CEUs provided)

To register, call **402-559-6345**.
Registration deadline: Oct. 1

Or visit **www.omahawomenshealthandwellness.org**.

Visit Our New Website!

Wondering where to go to learn about the new CPR guidelines, new treatments for the heart, what your cholesterol numbers mean or the latest advances in cancer treatment? It's all right here! The Nebraska Medical Center's new website makes getting the latest health information easier than ever. **See for yourself! Visit us at www.NebraskaMed.com.**



health & wellness club events

The Nebraska Medical Center's Health and Wellness Club is free to all individuals ages 50 and older. Club members enjoy occasional discounts, fitness programs, health education and screenings, social activities and a calendar of local programs to help you live a healthier lifestyle. For more information or to join the Health and Wellness Club, please call **800-922-0000** or check us out online at www.NebraskaMed.com/club. Call **800-922-0000** for more information or to sign up for these classes and events.

MONTHLY HEALTH SEMINARS

Storz Pavilion, Rooms 1 & 2. Lunch served at noon; speaker begins at 12:15 p.m. Event is free. Reservations required. Space is limited.

WALKING CLUBS

Henry Doorly Zoo Walking Club
Walking Club meets every Friday morning from 8 to 8:30 a.m. at the main gate. Zoo membership required. For more information, call **402-738-2076**.

Lauritzen Garden Walkers

Walkers meet every Tuesday at 8:30 a.m. from April through October. Meet at Visitor and Education Center. Garden membership required or daily admission fee for nonmembers.

SPECIAL OFFERINGS

AT JOSLYN ART MUSEUM

Third Thursday Art Encounters Club
Enjoy docent-guided tours of Joslyn's permanent collection and special exhibitions on the third Thursday of every month at 10:30 a.m. Free admission with presentation of your Health and Wellness Club membership card.

Visualizing Literature Book Club

Meets four times annually, 10 a.m. to noon in the Joslyn Art Museum conference room. Free admission with presentation of your Health and Wellness Club membership card.

Volunteer Opportunities

Studies show those who volunteer are happier and healthier. The Nebraska Medical Center has many volunteer opportunities. Application and

minimum time commitment required. Please call **800-922-0000** for more information.

UNMC EngAge Wellness Program

Join the UNMC EngAge Wellness program to begin your journey to optimal aging through a whole-person wellness approach that encompasses social, physical, intellectual, spiritual, emotional and vocational wellness. Located in the Home Instead Center for Successful Aging on Leavenworth at 38th Avenue. For more information on our current specials, visit us at www.unmc.edu/homeinsteadcenter/wellness or call **800-922-0000**.

Tai Chi Exercise Class

Great for improving balance and reducing your fall risk. Appropriate for all ages and fitness levels. Please call **800-922-0000** for class times and locations.



Interested in becoming a Health and Wellness Club member? Please call **800-922-0000**.

Comprehensive Care Improves Lives of Cystic Fibrosis Patients

It wasn't so long ago that individuals diagnosed with cystic fibrosis (CF) were lucky to live through their teenage years. New medical treatments introduced over the past 30 years, however, have greatly improved survival rates for people with CF. Many people now live well into their 30s, 40s and beyond. Getting early and proper care is essential in achieving the best outcomes and long-term management of the disease.

Cystic fibrosis is an inherited condition that affects the lungs and digestive system. A genetic defect causes the body to produce mucus that is thick and sticky rather than loose and watery. Instead of sweeping out bacteria from the lungs, the mucus can clog the lungs and lead to life-threatening infections. The mucus also blocks the pancreas, which prevents natural enzymes from breaking down and absorbing food.

"Cystic fibrosis is a very challenging and complex disease," says Peter Murphy, MD, medical director of the Adult Cystic Fibrosis program at The Nebraska Medical Center, the only comprehensive program of its type in the region. "Studies show that those who are treated at a dedicated CF center are able to manage their disease with the greatest success and have the longest survival rates."

Early diagnosis and aggressive disease management have contributed greatly to improving quality of life and

life expectancy for CF patients. The CF program at The Nebraska Medical Center uses a multidisciplinary approach to care, which includes dedicated physicians, dietitians, nurse practitioners, a social worker and a research coordinator.

CF is diagnosed through sweat testing and a newborn screening. Once diagnosed, patients are started on a rigorous course of therapy that helps slow the progression of the disease and manage its symptoms. Poor management of symptoms can lead to recurring illnesses and infections, and progressive damage to the lungs.

Treatment involves several strategies. This includes daily airway clearance techniques that loosen and clear mucus from the lungs. Oral or inhaled medications allow drugs to reach the airways more quickly and may include several types: medications that thin the mucus; antibiotics to treat infections; and saline that provides the airways with more water to help people with CF cough up mucus. Proper nutrition is also important.

"With early intervention and proper treatment, most people with CF can live a fairly normal life," says Dr. Murphy. "We have adopted a successful model of team care and multidisciplinary management of the disease that is very personal and has produced some of the best outcomes in the country." ■



Find help for CF.

For more information about cystic fibrosis, visit us at www.NebraskaMed.com/CF.

New CPR Guidelines Uses Hands Only

Recent changes to CPR guidelines have made it easier for the untrained bystander to administer this lifesaving technique. The American Heart Association guidelines advise untrained rescuers to focus on hands-only CPR so that more bystanders will be encouraged to help, increasing the chances that more lives can be saved.

"Studies suggest that more people survive cardiac arrest when a bystander gave them hands-only CPR compared to CPR with breaths," notes Daniel Anderson, MD, cardiologist at The Nebraska Medical Center. This was due to the simple fact that untrained bystanders are reluctant to perform mouth-to-mouth breathing.

Untrained bystanders should deliver hard, fast chest compressions, which keep the blood circulating to vital organs. To administer chest compressions, place the heel of one hand in the middle of the chest on the breastbone between the nipples. Put your other hand on top of the first with your fingers interlaced. Compress the chest at least 2 inches at a rate of 100 compressions per minute.

"If you're not compressing hard enough, you will not provide any benefit to the victim," says Dr. Anderson. "Using two-handed compressions will help facilitate successful compressions."

Continue chest compressions until help arrives or the victim wakes up. If you are trained in CPR, deliver 30 chest presses followed by two breaths, alternating between the two.

Sudden cardiac arrest (SCA), which means the heart suddenly stops beating, is the leading cause of death in the United States. Survival rates outside the hospital range as low as 3 percent. SCA is a highly lethal event. Immediate, effective CPR can more than double a victim's chance of survival.

For More Expert Heart Advice

The cardiologists at The Nebraska Medical Center are leaders in their field. To schedule an appointment, call **800-922-0000**.



Stricter Guidelines for Managing

Every year, doctors diagnose more than a million concussion cases in the United States. Those most likely to suffer such a brain injury include adolescents ages 15 to 19.

Your teen collides with another player during a football game and briefly loses consciousness. Shortly afterward, he says he is fine and is ready to play again. Do you let him back in the game?

“Anytime there is a hit or blow to the head combined with some fogginess, confusion or headaches or other neurological symptoms, you should err on the safe side and keep your child out the rest of the game,” says Kenneth Blad, MD, family practitioner at The Nebraska Medical Center, who has received specialized training in concussions.

Accumulative evidence reveals that our brains may need more time to heal from injuries than previously thought. As a result, new guidelines to how we assess and recover from concussions are being adopted by high schools and professional sports teams nationwide.

“This is especially true for younger athletes,” says Dr. Blad. “Before the age of 21, the brain takes longer to heal compared to that of an adult because it is not yet fully developed. Likewise, the consequences from injury to the brain can also be more severe.”

Medical experts now recommend the use of the ImPACT (Immediate Post-Concussion Assessment and Cognitive Testing), the most widely used and scientifically validated computerized concussion evaluation system to evaluate an athlete’s neurocognitive function. This evaluation measures an athlete’s

post-injury condition using multiple aspects of cognitive functioning, including attention span, working memory, sustained and selective attention time, response variability, nonverbal problem solving and reaction time. The results of this test help track recovery for safe return to play, thus preventing the cumulative effects of concussion.

Athletes who are not fully recovered from a concussion are significantly more vulnerable for recurrent, cumulative and even catastrophic consequences of a second concussion, says Dr. Blad. “In the past, we based our assessment entirely on whether there was loss of consciousness and other physical symptoms, such as amnesia, headaches or confusion. Now we know that physical symptoms alone are not very reliable in determining the severity and impact of a concussion. This test provides us with concrete evidence in determining when a child is ready to return to sports.”

Athletes who return to sports before their brains have completely healed may experience chronic cognitive and neurobehavioral difficulties referred to as post-concussion syndrome, notes Dr. Blad. Long-term side effects include chronic headaches, fatigue, sleep difficulties, personality changes, sensitivity to light and noise and dizziness, as well as deficits in short-term memory, problem solving and intellectual functioning.



Concussions

“Should athletes suffer a second blow to the head while recovering from an initial concussion, they risk suffering severe and potentially catastrophic consequences, such as massive brain swelling, herniation of the brain and even death,” says Dr. Blad.

Ideally, all teens at the junior and senior high school levels involved in sports should have a baseline ImPACT study done to provide a point of comparison, should the child suffer a concussion, says Dr. Blad. This can be done at most Omaha schools or at a doctor’s office that has access to the online ImPACT test. ■

Watch Our Video

Learn more about concussions from Peter Lennarson, MD, a neurosurgeon with The Nebraska Medical Center, at www.youtube.com/NebraskaMedcenter.



q & a...

I’ve heard that sea salt is better for me than table salt. Is this true?

Daniel Mathers, MD, cardiologist

The primary difference between sea salt and regular table salt is the number of additives. Sea salt contains fewer additives than regular salt, so it is often touted as a healthier alternative. Otherwise, both types of salt have the same basic nutritional value and consist mostly of two minerals—sodium and chloride.

Sea salt is obtained by evaporating seawater. This leaves traces of minerals behind, which lend the salt a different flavor than table salt. Cooks often like to use sea salt because they believe it provides better taste and texture than table salt. Table salt is mostly sodium chloride and is mined from underground salt deposits. It undergoes more processing to eliminate trace minerals and includes anti-clumping additives, as well as the additive iodine, an essential nutrient for human health.

By weight, table salt and sea salt contain about the same amount of sodium chloride. However, when used at the table, you may tend to use more sea salt because it often comes in larger granules. No matter which you use, you should strive to keep sodium consumption between 1,500 and 2,300 milligrams a day. If you have high blood pressure, are African-American or middle-aged, you should aim for 1,500 milligrams or less.



Is juicing healthier than eating whole fruits or vegetables?

Nessie Ferguson, registered dietitian

Nutrient per nutrient, juicing versus eating whole fruits and vegetables offers about the same amount of nutrients found in whole fruit. However, you do miss out on some of the healthy fiber that is lost during most juicing.

One of the benefits of juicing is that it eliminates any cooking or processing of fruits and vegetables that can destroy some of their important nutrients. Plus, juicing allows you to get antioxidants in greater concentrations because you will probably be consuming more fruits and vegetables in greater varieties this way. Currently, there is no research that indicates that juicing is healthier for you than eating whole fruits and vegetables. However, if you’re not normally a fan of fruits and vegetables, and you don’t mind the extra preparation time and cleanup, this can definitely be a healthy alternative. Some tips to juicing: Try to use as much of the pulp as possible as it provides healthy fiber and can help fill you up. Plan to make only the amount you are going to eat, as freshly squeezed juice can develop harmful bacteria fairly quickly. In addition, be aware that some fruits and vegetables can contain high amounts of sugar and may even lead to weight gain when consumed regularly.

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The Medical Benefits of Massage

For many, massage often has been considered a luxury rather than a health benefit. But that is beginning to change. “Many people now consider it to be part of a preventive health regimen as they look for nonpharmaceutical ways to stay healthy,” says Megan Krenzer, licensed massage therapist at The Nebraska Medical Center.

A growing body of evidence suggests that massage can provide numerous health benefits. It is being used not only to relieve muscle soreness, stress and tension but also as a complementary therapy to aid in the recovery of disease and illness, such as cancer.

A recent study by the National Institutes of Health showed that massage helps boost the immune system and prevents stress-induced illness by increasing blood flow and circulation of the lymphatic system, which is responsible for ridding the body of toxins and increasing the number of lymphocytes (white blood cells that are part of the immune system) while also decreasing levels of the stress hormone cortisol. Other benefits of massage include improved sleep quality and reduced edema and back pain.

“Many hospital programs now use massage to reduce postsurgical pain, constipation, anxiety, nausea and fatigue, and to increase general well-being,” says Krenzer. “We offer a grant-funded program to provide hand and foot massages to our cancer patients to help reduce stress and decrease nausea while they undergo chemotherapy.”

The benefits of massage in reducing muscle soreness after a workout were also recently validated. A small study in



More About Massage To learn more about the benefits of massage, visit us at www.NebraskaMed.com/massage.

the *Journal of Athletic Training* found that a 10-minute massage cut soreness after exercise by about 30 percent.

There are many different styles of massage—from gentle strokes to deeper kneading motions. Some are geared toward stress relief, whereas others are aimed at a particular medical problem, such as muscle spasms. Licensed massage therapists are trained to provide the proper technique for your needs. “Even 10- to 15-minute back and neck massages can provide amazing and lasting benefits for the rest of the day by reducing anxiety and tension, lowering blood pressure, and increasing overall mood and morale,” says Krenzer.

If you are in good health, Krenzer recommends scheduling a monthly massage for overall health and wellness.

For acute injury or pain, she suggests shorter 20- to 30-minute site-specific massages weekly (with physician approval) until the pain subsides. ■

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