

Boomers as Healthcare Consumers What Primary Care Physicians Can Expect

The baby boomer generation will bring a whole new set of rules into their doctors' offices," says Mary Jo Welker, MD, executive director of the Ohio State University Primary Care Network. "Because this generation is more interested in prevention than their parents' generation, as they get older they will be thinking about what they need to do, not only to live longer, but to live healthier lives.

"In addition, this is an Internet-savvy group of folks who will be coming to their doctors' offices armed with reports, articles and studies about new treatments, medications and tests that they will want their primary care physicians to discuss," Welker says. "The long-term patient-doctor relationships that we build with these patients are important, because different issues will arise as patients age and their personal medical history and family history change."



Mary Jo Welker, MD

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Mary Jo Welker, MD



screenings, exercise regimens and supplements, and to have many questions about the efficacy of different modalities, including yoga, massage and weight management.

Seeking Alternatives

Glen Aukerman, MD, medical director of the Ohio State University Center for Integrative Medicine, agrees. "Many patients, not just the baby boomer generation, but anyone who has suffered a health challenge - be it heart attack, cancer or arthritis - is interested in learning more about how to take better care of themselves," he says.

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Aukerman notes that 36 percent of American adults reported using some form of complementary or alternative medicine in a recent study by the National Institutes of Health's National Center for Complementary and Alternative Medicine, and the National Center for Health Statistics (part of the Centers for Disease Control and Prevention).

"We are dedicated to making available a diverse range of healthcare services and education not provided in many traditional Western medical centers, while integrating all facets of care into a comprehensive plan for each patient and ensuring that close communication is maintained with each patient's primary care physician," he adds.

Focusing on the Future

"As any patient population ages, their risk for cardiovascular issues rises," says Robert Murden, MD, of Ohio State's Department of Internal Medicine. "In that regard, baby boomers are not significantly different from prior generations. What is different, however, is that they as a group grew up on a diet of fast food that simply was not widely available prior to the 1950s. Therefore, a large segment of boomers may face obesity-related problems, including diabetes, in greater numbers than earlier generations.

"What I emphasize to incoming medical students is that personalized medicine is something that should always be stressed - in addition to being vetted, interventions must be individualized for each patient," Murden says. "For example, a hypertension therapy that works for one patient may not work for another; therefore, as physicians we need to be aware of each patient's lifestyle choices and physical characteristics - in most cases including genetics - and tailor an approach customized for that individual. This is what consumer-oriented baby boomer patients will be expecting from us as well."

For more information or to contact Drs. Welker, Aukerman or Murden, call 1-800-293-5123.



Glen Aukerman, MD



Robert Murden, MD

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A Personalized Approach



Hagop Mekhjian, MD

"A well-accepted practice is that every patient with cardiovascular risk factors should be prescribed a baby aspirin a day to decrease the likelihood of heart attack and stroke. Although this practice is based on scientific evidence, it should be individualized in the context of personalized health care," says Hagop Mekhjian, MD, chief medical officer at Ohio State University Medical Center.

"There is medical evidence that as many as one out of every five patients - 20 percent - may be aspirin non-responders and therefore may not benefit from this therapy," he explains. "However, there are tests available to assess individuals' aspirin responsiveness or non-responsiveness and to help make a determination of either continuing this therapy or, in the case of non-responders, of exploring treatments with other anti-platelet agents.

"Personalized health care is that type of care that meets the unique needs of each individual, taking into account the complex interactions of the genetic makeup of that individual, environmental influences and also the patient's behavioral aspects," Mekhjian adds.

For more information or to contact Dr. Mekhjian, call 1-800-293-5123.

Just The Facts

- The baby boomer generation is defined as those born between 1946 and 1964.
- In 2006, the first wave of the approximately 76 million Americans who represent this generation turned 60 years old.
- In a 2006 national survey of baby boomers, sponsored by the American Association of Retired Persons, 87 percent of those surveyed identified one of their remainder-of-life goals as wanting "to take better care of their health."



news briefs

From Ohio State University Medical Center

Ohio State to Develop Cancer Survivorship Center Through Lance Armstrong Foundation

The Lance Armstrong Foundation (LAF) has awarded a \$1.25 million grant to the Ohio State University Comprehensive Cancer Center (OSUCCC) and Ohio State University Medical Center's James Cancer Hospital and Solove Research Institute for improving the care and quality of life of cancer survivors. The five-year grant will help Ohio State develop a cancer survivorship center, bolster cancer research efforts in survivorship and expand educational and support services for cancer survivors. Ohio State's cancer center is one of seven cancer centers at leading medical institutions that constitute the LAF's Livestrong Survivorship Center of Excellence Network. Charles Shapiro, MD, director of breast medical oncology at Ohio State, will direct the new center. Electra Paskett, PhD, MSPH, associate director for population sciences at the OSUCCC, will be co-director.

For more information or to contact Drs. Shapiro or Paskett, call 1-800-293-5123.



James O'Brien, MD

Data Portal Increases Accuracy, Efficiency in ICU

A new high-tech information bank in the Intensive Care Unit (ICU) at Ohio State's Medical Center improves the flow of information from the patient's bedside and enhances patient care, safety and data collection. The bank acts as a central depository for data collected from each patient in the ICU. Data from patients on study protocols are also automatically registered. "This application is tied to an information-gathering system that can quickly update patient information, thereby increasing the data's accuracy and efficiency," says James O'Brien, MD, a pulmonologist and critical care specialist at the Medical Center. The data-entry system allows ICU physicians and nurses to prioritize and monitor general prevention statistics such as medications, safety, pain/comfort, nutrition and documentation, almost at the moment that the care is being delivered.

For more information or to contact Dr. O'Brien, call 1-800-293-5123.

Fetal Nasal Bone Aids Prenatal Diagnosis

Physicians at Ohio State's Medical Center are using a measurement of the fetal nasal bone in conjunction with first trimester ultrasound screening to detect risks of fetal abnormalities and birth defects. This method provides an even greater detection rate and a lower false positive rate than other diagnostic tests. "Standard tests do a good job of detecting Down syndrome," says Richard O'Shaughnessy, MD, a maternal-fetal medicine specialist, "but by considering those tests together with a measurement of the nasal bone, the number of false positive results can be reduced." Studying the ultrasound, a sonographer examines details such as a flatter facial profile, nasal hypoplasia and underdevelopment of the nasal bone. Now earlier than ever before, in the first trimester, a sonographer can look for the presence or absence of the nasal bone to determine risk for chromosomal abnormalities.

For more information or to contact Dr. O'Shaughnessy, call 1-800-293-5123.



Richard O'Shaughnessy, MD

New Screening Key to Detecting Hereditary Colon Cancer Syndrome

A new screening test performed on all colon cancer patients at Ohio State University Medical Center's James Cancer Hospital and Solove Research Institute may be key to detecting a hereditary cancer syndrome that puts people at high risk for tumors of the colon, endometrium, stomach and ovaries. The screening for Lynch syndrome started after a 2005 study by cancer researchers at Ohio State's Comprehensive Cancer Center found that 2 to 3 percent (at least one in 45) of people with colon cancer probably have mutations for the inherited syndrome. The screening test helps determine if the person and his or her relatives should consider genetic counseling and testing for the syndrome. The James is one of the first hospitals nationwide to routinely screen for Lynch syndrome at the time of diagnosis, says Heather Hampel, a genetic counselor in the Clinical Cancer Genetics Program at Ohio State and first author of the study.

For more information or to contact Heather Hampel, call 1-800-293-5123.

access

Orthopedic Issues Common in Boomers

The American Academy of Orthopaedic Surgeons reports that one in seven Americans suffers from musculoskeletal impairment, accounting for approximately 56 million physician visits annually. These impairments detract from health-related quality of life and decrease an individual's ability to perform routine activities. Ohio State University Medical Center orthopedic surgeons specialize in specific areas:

Shoulder

"When family practice physicians see baby boomers who are complaining of shoulder pain, often the patient cannot relate a specific incident that caused the pain," says Julie Bishop, MD. "Most often the problem is a rotator cuff tear that is not really an injury, but rather a result of normal wear and tear on the tendon."

Bishop says when pain awakens a patient at night or interferes with the ability to reach above shoulder level, and when a primary care physician detects weakness on exam, the problem is usually more than tendonitis.

"On referral, I generally order an MRI to confirm," she says. "When the patient is an active boomer and wants to remain active, surgical repair is in order, but in older and less active patients, resting the shoulder from aggravating activities, medications and physical therapy may help the pain subside. Certainly some younger, less active patients may want to try this conservative route first as well." She adds that adhesive capsulitis, which is more common in women and patients with diabetes, may heal with physical therapy alone in 90 percent of cases.

Hand

"While rheumatoid arthritis is generally well-controlled medically, osteoarthritis remains the bigger problem for baby boomer patients with hand pain," says Ryan Klinefelter, MD. "Family practice physicians do a great job of helping patients cope with symptoms, but once anti-inflammatory medications, steroid injections and activity modification no longer help with pain and loss of motion, surgery can help."



Klinefelter says a glucosamine supplement has not proven to be helpful for osteoarthritis in the hand. Surgically, he recommends soft tissue reconstruction for arthritis of the thumb CMC joint and fusion for arthritis of the DIP joints. "There are indications for synthetic knuckle replacement in the MCP or PIP joints, but each patient must be evaluated to determine if it is an appropriate option," he says. "We also see quite a bit of carpal tunnel syndrome in the baby boomer population, which also is amenable to surgical intervention."

Knee and Hip

"Osteoarthritis is often the culprit in hip- and knee-related pain for boomers," says Cornel Van Gorp, MD, director of the Division of Hip and Knee Replacement Surgery. "The baby boomer demographics' future needs for knee replacement are astronomical. According to the most recent projections presented at the 73rd annual meeting of the American Academy of Orthopaedic Surgeons, there were roughly 500,000 total knee replacements performed in the United States last year; this projects to 3.5 million by 2030.

"When patients are having activity-related and night pain that is not adequately managed with medication, and there is radiographic evidence of advanced arthritis,

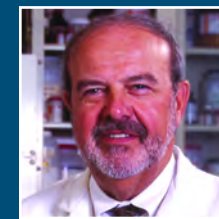
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From Ohio State University Medical Center research highlights

Chemicals in Brown Algae May Guard Against Skin Cancer

Substances from a marine seaweed may protect against skin cancer caused by too much sun, new research suggests. An animal study at Ohio State's Comprehensive Cancer Center indicates that brown algae polyphenols (BAPs) found in a type of marine seaweed might protect against skin cancers caused by ultraviolet B (UVB) radiation in sunlight, which is thought to be responsible for 90 percent of the estimated 1.3 million cases of non-melanoma skin cancer diagnosed in the United States annually. "These compounds seemed dramatically effective at fairly low doses both orally and topically" in mice studies, according to principal investigator Gary Stoner, PhD.



Gary Stoner, PhD

For more information or to contact Dr. Stoner, call 1-800-293-5123.

Grant to Fund Study of Genetics and Hip Fracture Risk

A pioneer in women's health at Ohio State's Medical Center will conduct the first-ever genome-wide study of the relationship between genes and hip fractures. Rebecca Jackson, MD, vice chair of the Steering Committee of the Women's Health Initiative, will receive \$4.1 million over two years from the National Heart, Lung and Blood Institute to learn why some women are more likely than others to break their hips. It's a problem with huge economic implications. The National Center for Injury Prevention and Control says an estimated 300,000 hip fractures occur in the United States each year. The average cost for treatment and recovery is about \$40,000 for hospital care alone, and over half of the patients never regain normal function. "It only makes sense that we learn as much as we can about any predisposing conditions, including genetic abnormalities," Jackson says.



Rebecca Jackson, MD

For more information or to contact Dr. Jackson, call 1-800-293-5123.

Researcher Uncovers 'Fungal Stealth Technology'

A researcher at Ohio State's Medical Center, along with colleagues at Washington University in St. Louis, has discovered one way in which fungal pathogens hide from host immune cells and thereby invade the host organism. The immune system typically detects features on the surface of microbial invaders and works to neutralize or destroy them. But a team led by Chad Rappeleye, PhD, found that the disease-causing forms of *Histoplasma capsulatum* cells surround themselves with a polysaccharide coating that is absent from non-pathogenic fungal cells. This conceals *Histoplasma* from the immune system and enables infection to progress undetected - a finding that enhances understanding of how fungi cause infections and may help determine methods to prevent or treat them.

For more information or to contact Dr. Rappeleye, call 1-800-293-5123.

Gene Therapy Shows Promise As Therapy for Diseased Limbs

New research suggests that gene therapy is a safe treatment method to explore in patients whose lower limbs are at risk for amputation because of poor circulation caused by blocked blood vessels. In a phase I clinical trial, almost half the patients receiving gene therapy reported complete resolution of chronic pain one year after treatment, and more than a quarter of patients with chronic wounds experienced complete healing of those ulcers in the same time frame. The results appear online and were published in the March 13 issue of the journal *Circulation*. The researchers are the first to report on testing of the effects of the hypoxia-inducible factor-1 alpha (HIF-1a) gene as the basis of treatment for limbs damaged by compromised blood flow. Though the trial largely focused on the therapy's safety, "The bottom line is that 34 patients improved to varying degrees with this treatment," says Sanjay Rajagopalan, MD, director of vascular medicine at Ohio State University Medical Center and first author of the *Circulation* article.

For more information or to contact Dr. Rajagopalan, call 1-800-293-5123.

Weekend Warriors May Face Heart Trouble

“Although some members of the baby boomer generation have been involved in sports and fitness pursuits their entire lives, many more are interested in beginning a rigorous program after age 50. Hopefully, these so-called ‘weekend warriors’ will ask their primary care physician for a cardiac evaluation prior to getting started,” says Christine Lawless, MD, MBA, director of preventive and sports cardiology at the Ohio State University Sports Cardiology Clinic.

“A personalized exercise prescription should take into account the patient’s ability, as well as willingness.”

Thomas Best, MD

Lawless, the only specialist in the United States with board certification in both cardiology and sports medicine, notes that she and her colleagues evaluate and determine cardiac fitness for individuals who wish to participate in recreational sports or begin a fitness routine, as well as those who experience cardiac symptoms during exercise, including chest pain, palpitations, shortness of breath, dizziness or syncope.

“For active boomers, it’s important to evaluate fitness for continued sports participation on at least an annual basis,” adds Lawless, who also serves as consulting cardiologist to the Ohio State University Department of Athletics. “In addition to screening for risk factors (see box), CT angiography or CT scan with calcium scoring may provide a more accurate assess-

ment for patients who have vulnerable plaques that may not be apparent through routine stress testing.”

Thomas Best, MD, PhD, director of the Division of Sports Medicine, agrees that assessment for cardiac risk factors is important. “For those patients who are hypertensive, overweight or smoke, it becomes especially important to personalize their exercise program,” he says.

“One of the greatest values a primary care physician gives his or her patients is the personal relationship, developed over time,” adds Best, who also is co-director of Ohio State’s Sports Medicine Center. “This really comes into play for older patients who want to become fit. According to the American College of Sports Medicine, in addition to cardio fitness, strength-training is being recognized as increasingly important, as people begin to lose muscle mass after age 20.

“A personalized exercise prescription should take into account the patient’s ability, as well as willingness,” Best adds. “Two 15-minute sessions per day may be more doable than one 30-minute session for many of our patients who are busy personally and professionally.”

For more information or to contact Drs. Lawless or Best, call 1-800-293-5123.



Thomas Best, MD



Christine Lawless, MD

Clinical Checklist



OHIO STATE UNIVERSITY SPORTS CARDIOLOGY CLINIC

- Pre-participation cardiac evaluation for all athletes, age 13 and above, including “weekend warriors”
- Evaluation of any athlete with symptoms of chest pain, shortness of breath, palpitations, dizziness or blackouts
- Risk assessment and counseling for athletes with known heart conditions

CARDIAC RISK FACTORS

- Hyperlipidemia
- Hypertension
- Inactivity
- Overweight/obesity
- Waist circumference greater than 35 inches for women; 40 inches for men
- Diabetes
- Family history of cardiac disease
- Cardiac symptoms

new faces



Adele Lipari, DO

Specialty:
Breast imaging

Clinical Interests:
Breast imaging, breast cancer, image-guided biopsy and localizations

Residency:
St. Elizabeth Hospital Medical Center, Youngstown



Michael Firstenberg, MD

Specialty:
Cardiovascular medicine

Clinical Interests:
Adult acquired and congenital cardiac surgery, cardiothoracic critical care, mechanical assist and heart failure

Residency:
University Hospitals of Cleveland

Fellowship:
Ohio State University Medical Center



Vasudevan Raghavan, MD

Specialty:
Endocrinology

Clinical Interests:
Lipid disorders, obesity medicine, metabolic syndrome/pre-diabetic state, prevention of atherosclerotic cardiovascular disease, treating dyslipidemia

Residency:
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Fellowship:
Baylor College of Medicine, Houston

To contact any of these physicians, please call OSU Care Connection at 1-800-293-5123.

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replacement is a reasonable option,” Van Gorp says. “In addition, patients in this demographic are noticing that friends and colleagues are enjoying a better quality of life after knee or hip replacement, so with approximately 95 percent of both these procedures successful at 10 years and 85 percent still holding at 15-20 years, the demand is in part consumer-driven.”

David Flanigan, MD, of the Division of Sports Medicine, notes that baby boomers’ active lifestyles often result in

acute injuries for these joints. “Regardless of whether the meniscus tear or cartilage injury was caused by a degenerate condition or a traumatic, activity-related injury, it’s more likely to happen as we get older,” he says. “Minimally invasive surgery is a good option when joint surfaces are in good condition. When osteoarthritis is involved, open surgery is better, and I often refer active boomers to Dr. Van Gorp to discuss replacement options.”

For more information or to contact Drs. Bishop, Klinefelter or Van Gorp, call 1-800-293-5123.



Julie Bishop, MD



Ryan Klinefelter, MD



Cornel Van Gorp, MD