Packard's triple transplant record

In an extremely rare, three-day series of transplants, three young adults received new hearts at Lucile Packard Children’s Hospital at Stanford, including an extraordinarily uncommon double-organ heart and liver transplant.

“It was remarkable,” said David Rosenthal, MD, director of the pediatric heart failure program. “We normally perform around 15 heart transplants a year, and now we did three in three days.”

On May 3, Amanda Sechrest, 20, received a new heart and liver. The next day, as Amanda was beginning her recovery, 17-year-old William Wylie-Modro was being prepped for surgery. By Saturday morning, he had a new heart. Completing the three-day chain was 18-year-old James Spencer, who received his lifesaving heart on May 5.

“On a difficulty scale of 1 to 10, all three surgeries were in the 8 to 10 range,” said cardiothoracic surgeon Olaf Reinhardt, MD, who led all three operations, with liver transplant pioneer Carlos Esquivel, MD, leading the transplant of Amanda’s liver. The transplant patients are now recovering from their surgeries.
Sound Bites

The Mercury News

“Heartburn is your body telling you there’s something wrong. Unfortunately, enough physicians don’t ask about it and patients don’t tell.”
—Ann Chen, MD, assistant professor of gastroenterology, on Stanford Cancer Institute’s online tool for women with BRCA1 and BRCA2 breast cancer mutations. April 28

San Francisco Chronicle

“I wanted to develop a tool to give women the raw numbers—the probability of getting this cancer, the probability of surviving—and they could decide what that means for them.”
—Sylvia Plevritis, MD, associate professor of radiology, on Stanford Cancer Institute’s online tool for women with BRCA1 and BRCA2 breast cancer mutations. April 23

Scientific American

“While there is an enormous survival difference between some counties and others, it is the social and environmental characteristics of a given county and its population that matter the most.”
—Mark Cullen, MD, chief of General Medical Disciplines at Stanford School of Medicine, on his study which found that social factors, such as education, marital status and income, are better indicators of the risk for early death than race or geography. April 17

CBS NEWS

“I love seeing them and knowing that they are now living life as normal 2-year-olds. That has been our goal all along.”
—Gary Hartman, MD, clinical professor of pediatric surgery, regarding the successful separation of once-conjoined twins Angelica and Angelina Sabuco. May 1

Banking for transplants

Cord blood program expands stem cell registry

A new public cord blood collection program at Lucile Packard Children's Hospital is now enabling new parents to donate their baby’s cord blood to an international stem cell transplant registry. Stem cell transplants cure leukemia, lymphoma and inherited blood diseases by replacing a patient’s blood-forming cells with those from a healthy donor.

“This is a public service project to expand the donor pool,” said Rajni Agarwal, MD, the clinical director for pediatric stem cell transplantation at Packard Children’s and medical director of the new collection program. “It will help physicians do more stem cell transplants and save more lives.”

The new program makes Packard Children’s the first Northern California hospital to both collect cord blood donations and use them in stem cell transplants. Blood left in the umbilical cord and placenta after delivery is a rich source of stem cells, which can differentiate into a variety of blood cells. Right now, nearly all cord blood is discarded as medical waste, while patients who need transplants sometimes die for lack of a donor.

Resource for others

Cord blood can be collected at no risk to a new mother and baby, and given to unrelated patients who need the stem cells. This public system is distinct from private cord blood banks, which charge families fees to collect cord blood and store it for the possibility of their own personal use.

“The chance of needing banked cord blood for your own child is very remote,” said Maurice Druzin, MD, division chief of Maternal-Fetal Medicine at Packard Children’s. Because blood cancers are so rare, very few families who privately bank cord blood use the cells, he explained. “But these cells are potentially lifesaving for someone else.”

Cord blood has important advantages over bone marrow—the most commonly used source of stem cells for transplant. It can be collected noninvasively at birth and matched to more potential recipients than bone marrow. Additionally, while bone marrow registries have relatively few donors from ethnic minority groups, Packard Children’s obstetric patients reflect the great diversity of the Bay Area’s population, which means the hospital’s donations could greatly diversify the cells available for transplant, helping more minorities to find a match.

A mother’s initiative

The program began because an expectant mother, Stanford law professor Amalia Kessler, JD, PhD, was surprised that she could not find any Bay Area hospitals collecting cord blood donations. During her first pregnancy in 2009, Kessler and her husband, Adam Talcott, decided they would rather donate their baby’s cord blood than bank it privately.

“We were bombarded with mailings and calls from private cord blood companies,” Kessler said, “but we wanted to do something that would be more valuable.”

Kessler asked a colleague, Hank Greely, JD, who is a professor of law with an expertise in genetics, to propose the idea of a cord blood donation program. Greely worked with bone marrow transplant expert Karl Blume, MD, an emeritus professor at the School of Medicine, to get the idea off the ground. Although the program wasn’t ready in time for Stella Talcott’s 2009 birth, that changed by the time little brother Ari arrived in the fall of 2011. His cord blood became the first to be donated at Packard Children’s.

The public cord blood program is a joint effort with MD Anderson Cancer Center in Houston, which already has an established cord blood bank. Packard Children’s is currently the only hospital in Northern California with an in-house collection system that can enroll any eligible donor mother when she comes to the hospital in active labor.

SEE CORD BLOOD ON PAGE 6
Mariann Byerwalter is a co-chair of the Campaign for Stanford Medicine, which was officially launched in May with a $1 billion goal. The chair of the board of directors of Stanford Hospital & Clinics, Byerwalter believes that the launch of the campaign to build a new Stanford Hospital and to advance medical research is a historic moment not only for the university and the community but for medicine at large. In an interview with Stanford Medicine News, Byerwalter spoke about the scope of the effort and how it could help change the face of health care. Byerwalter also serves as a member of the board of directors of Lucile Packard Children’s Hospital.

Why is this campaign so important?

This campaign supports a transformation of health care here at Stanford and around the globe. It will enable the completion of the new Stanford Hospital, which is critical to this community. The campaign will allow us to invest in the work of some of medicine’s best researchers and teachers, achieving medical milestones just ahead and training future educators. And, because this campaign builds on the assets of both Stanford Medicine and Stanford University, it will contribute solutions to the daunting challenges of health-care delivery in this country, addressing issues of quality, accessibility and affordability.

What have been some of the campaign’s most significant milestones to date?

We have raised $500 million in pledges and expectations for the new hospital. These include $175 million from generous donors to the project, $150 million from three leadership donors and $175 million in expectations from the Corporate Partners program. We’ve also done the hard work of preparing for the campaign and a project of this size by developing the volunteer structures, securing university approvals, working through the entitlement process with the City of Palo Alto and engaging faculty and staff.

What is the special significance of this project to the community?

For the past 50 years, local residents have had one of the world’s best medical teams—experts across all fields, working together—right here in the community, ready to deliver their patient care. Now we will have a hospital facility that matches the quality of that team. The campaign also will make critical investments in teaching and research programs that will shape the next chapter of medicine, including cardiovascular care, cancer (and women’s cancer), neurosciences, stem cell medicine, musculoskeletal medicine and surgical science. These are all areas in which Stanford Medicine will play a global leadership role in the future.

What are some key features of the hospital that will be financed by this project?

The new hospital will include a state-of-the-art Emergency Department that is approximately three times the size of the existing one. It will have interventional platforms that revolutionize acute care medicine by bringing together surgical, imaging, interventional and intensive care capabilities all in one space. It will also incorporate one of the world’s most advanced collections of medical imaging capabilities, allowing for more powerful diagnostics and noninvasive interventions. And it will be built upon a patient-centered design that focuses on the social and emotional needs of patients, with private rooms, in-room stays for loved ones, a central atrium and a garden floor.

How does this campaign compare with previous campaigns at Stanford?

Stanford Medicine has never asked its community to support a fundraising campaign of this magnitude. In the late 1980s, generous donors supported the Stanford Hospital Modernization Project, which built the newer patient care units in the existing hospital. But we have never targeted anything this ambitious. The recently completed Stanford Challenge, the most successful fundraising campaign in higher education in history, did not address medicine and patient care specifically and did not have the local community focus of this campaign.

Is this campaign just for major donors?

In a project of this magnitude, we all have a role to play, and we are exploring multiple ways to engage our larger community. This campaign will create a new hospital, but it also aims to completely rethink how health care will be in the future. That requires philanthropic commitments, large and small. But it also requires creative thinking, moral support, volunteerism and advocacy.

Why are you personally involved with the campaign?

I have a deep respect and passion for the life-changing and life-saving work taking place at Stanford. For more than 25 years I have committed myself to the work of the university. This campaign is the culmination of years of planning and preparation for the next transformation at Stanford Medicine, and it is unquestionably my top personal volunteer service commitment. I have witnessed the remarkable combination of volunteers, visionaries, community leaders and philanthropic partners uniting to improve healing, teaching and discovery. Today we face an even more remarkable transformation, and with our collective efforts we can make a difference for generations to come.

To learn more about the Campaign for Stanford Medicine, visit medicalgiving.stanford.edu.

Breaking new ground

The Breaking New Ground Campaign, launched in 2007, supports the child health programs of Stanford University School of Medicine and a transformative expansion of Lucile Packard Children’s Hospital. Campaign funds will add critical programs to train the next generation of pediatric leaders and discover new cures for childhood diseases. Illnesses such as cancer, asthma and diabetes pose serious threats to the well-being of children and require ever more effective treatments. Stanford physician scientists are engaged in promising research that spans a wide breadth of medical science with a common objective: better health for children worldwide.

Their discoveries in the laboratory are translated quickly into lifesaving care at Packard Children’s Hospital, which will eventually double in size—adding 150 new patient rooms and new surgical, diagnostic and treatment areas.

The expansion project is a breakthrough opportunity to design a world-class facility that provides patients and doctors with the most advanced clinical advancements and technology while also addressing the specialized needs of children and families.

To learn more about Breaking New Ground, please visit supportLPCH.org/Campaign.
But wasps are just one of several stinging or biting critters that can trip up a beautiful summer day in the Bay Area. There are also mosquitoes, rattlesnakes, ticks and jellyfish.

Luckily, Stanford Hospital & Clinics has perhaps the foremost concentration of wilderness medicine physicians in the nation, including emergency medicine physician Paul Auerbach, MD, who with a team of experts wrote the definitive book on the subject, the roughly 2,300-page Wilderness Medicine (now in its sixth edition). It covers virtually everything that could give you trouble outdoors: bear attacks, sprains, altitude sickness, drowning, lightning, sunburn, heatstroke, volcanic eruptions—you name it.

Those looking for something lighter can turn to Auerbach’s paperback, Medicine for the Outdoors, which, at a little more than 500 pages, covers much of the important ground. Both books were consulted for this article, as were Auerbach himself and fellow Stanford wilderness medicine experts Robert Norris, MD, chief of emergency medicine, and Grant Lipman, MD, an emergency medicine physician and adventure race medical expert.

Mosquitoes
With the warm weather comes one of the season’s more ubiquitous pests: the mosquito. To foil these bloodsucking arthropods, there are essentially two preventive measures you can take: a physical barrier or insect repellent, or both, Auerbach said. “Wear something that covers your arms and legs,” he said. “Light-colored clothing is less attractive to mosquitoes. Insect repellent, especially one with DEET (N,N-Diethyl-meta-toluamide), is quite effective.”

Worse than its itchy bite, however, is the insect’s potential as a vector for infectious disease, such as West Nile virus. About 20 percent of people infected with the virus will develop flulike symptoms in three to 14 days. Less than 1 percent of those infected suffer more serious health problems, such as encephalitis or meningitis. (In 2011, there were 158 reported cases of West Nile virus among people in California and nine reported fatalities, according to the state Department of Public Health.)

Jellyfish
Unlike mosquitoes, jellyfish are not interested in preying on you. People are stung by these brainless, gelatinous sea animals when they accidentally brush against them or try to handle them. Luckily, species off the California coast are likely to inflict only mild or moderate pain, if any, Auerbach said. The Portuguese man-of-war is rarely sighted in Northern California waters.

If you know you’re going to be sharing the water with jellyfish, wear a wetsuit or synthetic-nylon dive skin, and give jellies wide berth, he said. Do not touch jellyfish in the water or on the beach.

A bluish jellyfish-like creature, the by-the-wind sailor (Velella velella), often washes up on West Coast beaches in large numbers during the spring and early summer, Auerbach noted. People sometimes confuse these small, plankton-eating hydrozoa—usually measuring only a few inches in width—with the much larger man-of-war. Although velella are considered mostly harmless to humans, Auerbach advised against touching them, which could cause skin irritation.

Rattlesnakes
“They would much rather be left alone, given the chance,” Norris said, referring to northern Pacific rattlesnakes, Northern California’s only native species of venomous snake.

An internationally recognized expert on venomous snake bites, Norris said that the Bay Area has a healthy population of these pit vipers. They are generally active from April through September but will sometimes emerge from hibernating in places like rodent holes, crevices and rock piles on warm winter or late-autumn days to sun themselves. “They are not deep hibernators,” Norris said.

You can find them in grasslands, in the woods, on hiking trails—“really, just about anywhere,” Norris said. “I’ve seen some patients who were bitten in Palo Alto; one was in her garden when it happened.”

If a rattlesnake crosses your path, give it the right of way. If it’s not moving, you can walk around it, making sure to stay at least several feet away, he said. The good news is that these

**Remedies for stings and bites**

**JELLYFISH:** Rinse the wound with seawater. Do use not fresh water, as this may stimulate more nematocysts, the jelly’s stinging cells, which become embedded in the skin, Auerbach said. Remove any tentacles with forceps or a gloved hand. Apply a compress soaked in vinegar or isopropyl rubbing alcohol to the wound for about 30 minutes or until the pain subsides. Then apply a layer of shaving cream and shave the affected area with a safety razor to remove any remaining nematocysts. If the stinging sensation persists, reapply the compress for another 15 minutes. An allergic reaction may cause difficulty breathing or swallowing, hives, a swollen tongue or collapse. In this case, call 9-1-1 and use an epinephrine auto-injector, such as an EpiPen, if available.

**RATTLESNAKES:** Get medical care immediately. If possible, call 9-1-1 and immobilize the affected extremity using a splint, but don’t compress the wound. Norris advised. “Don’t worry about other first aid,” he said. “If you’re in the wilderness, do whatever you need to get to a hospital, even if it means walking for a couple of hours. Time is the issue.” As long as bite victims are given antivenin within a few hours, their lives are rarely in danger.

**TICKS:** Remove the tick with tweezers, grasping it as close to the skin as possible and pulling steadily. Don’t jerk or twist, which may leave part of the animal in the skin. Wash your hands and clean the wound with soap and water before applying a mild antiseptic. It may be useful to save the tick, in case it’s needed later for identification or lab tests.

Lyme disease is not likely to be transmitted if the tick was attached to you for less than 48 hours, Norris said. In about 75 percent of infected people, a bull’s-eye-shaped skin rash appears an average of seven to 10 days after the bite. If you observe this rash or suffer from flulike symptoms within one or two weeks after being bitten, seek medical care. The disease can be treated with antibiotics.

**YELLOW JACKETS:** Quickly remove the stinger if it is embedded in the skin (though this usually doesn’t happen in the case of wasp stings), brushing it off with the edge of a fingernail or a credit card, or pulling it out with your fingers or tweezers. Apply ice or a cold compress to the sting—20 minutes on, 20 minutes off. Over-the-counter pain medica-

sions, such as acetaminophen or ibuprofen, may offer some relief. Applying a local antihistamine lotion to the sting also may help. Expect swelling, redness and possible blistering. If you have a history of allergic reactions to insect stings, it’s advisable to keep an epinephrine auto-injector on hand, such as the EpiPen, Lipman said.
snakes are not aggressive: If they feel threatened, they will generally try to slither away or give their infamous warning rattle (be aware that some snakes may have lost their rattles or not yet grown them). Their venom is fairly toxic, but very few people actually die from bites. Annually, there are some 8,000 venomous snake bites nationwide, resulting in only about six deaths.

To prevent bites, look where you're putting your feet and hands. Wear hiking shoes and long pants, Norris said. “Be alert, and don't step over logs,” he added. “If you're going through tall grass, use a walking stick to probe in front of you. The snake will often let you know it’s there.”

Ticks

Unlike the rattlesnake, the tick, another denizen of the California wilderness, has an incentive to bite you: Your blood could make for a satisfying meal. There are roughly a half-dozen tick species in California that will attach themselves to humans, but it's the western blacklegged tick that is the most notorious; it is a known vector for Lyme disease, the most common tick-borne disease in the state.

Immature ticks, known as nymphs, are about the size of a poppy seed, and they’re the most likely to be carrying the disease-causing bacteria. They like to hang out among leaves and fir needles on woodland floors. They also will climb up on logs and on the lower trunks and branches of trees. Adult ticks, which are less likely to carry the bacteria, prefer to sit on grasses and on bushes, waiting to latch on to prey.

When hiking in woodlands, grasslands or chaparral, or along hillside trails, wear light-colored clothes that cover your arms and legs, and tuck pants into your socks. Norris advised. Check your clothes and exposed parts of your body, including your scalp, for ticks every few hours. Insect repellents with DEET are effective deterrents, he added.

Yellow jackets

Yellow jackets are social wasps, sometimes confused with honeybees, and they typically become a problem for picnickers and other al fresco diners beginning in August. “Cover your food and keep a tight lid on trash cans,” Lipman advised. Don’t swat at the wasps; this can make them angry. Unlike bees, they are able to sting repeatedly, he added. Avoid crushing them, which releases a pheromone that acts as a kind of chemical alarm and may encourage other nearby wasps to attack. Steer clear of their nests, commonly found in rodent burrows, wall cavities, attics and old tree stumps, and under eaves.

Sunlight and the vitamin D dilemma

Vitamin D deficiency, believed to be linked to a wide range of health problems, is becoming increasingly common in the United States, affecting as many as 30 to 40 percent of the population. While vitamin D can be found in some foods, such as salmon and vitamin-fortified milk and orange juice, the most readily available source of the nutrient is through exposure to the sun. Researchers now theorize that in seeking to avoid skin damage that can lead to cancer, many people no longer get the sunlight their bodies need to produce adequate levels of vitamin D.

Once thought primarily to affect bone health, insufficient vitamin D has begun to be associated with a growing list of problems, including heart and kidney disease, high blood pressure, rheumatoid arthritis and several types of cancer.

Because too much sun can lead to skin cancer, the challenge is how best to balance the pros and cons. Jean Tang, MD, PhD, assistant professor of dermatology at Stanford, said that balance largely depends on an individual's level of risk.

"If you’ve had skin cancer, take a vitamin D supplement and don’t go out in the sun without sun protection," Tang said, including sunscreen, protective clothing and sunglasses at all times. Staying in the shade and avoiding the peak hours of sunlight between 10 am and 4 pm, especially in the summertime, is advisable for anyone who wants to protect against the worst of the sun's rays.

Most fair-complexioned individuals get enough vitamin D production through 10 minutes of incidental sunlight, said Susan Swetter, MD, a professor of dermatology and director of the Pigmented Lesion and Melanoma Programs at Stanford and the Palo Alto Veterans Affairs Health Care

When blisters are afoot

Most of us are not fond of our feet, perhaps because we constrict them with shoes and transform them into playing fields for that most common of foot problems: the blister.

And while most of us would prefer not to think about blisters, Grant Lipman, MD, an emergency medicine physician at Stanford Hospital & Clinics, believes they are the most common medical problem we experience when we venture outdoors and into the wild. Lipman has become a nationally known blister expert, in fact, and recently co-authored an entire chapter on blisters for Wilderness Medicine, compiled by his Stanford colleague Paul Auerbach, MD.

An estimated 10 million Americans go out hiking each year and at least one in seven will develop the classic blister caused by friction between foot, sock and shoe. The numbers also show that less experienced hikers are more likely to develop a blister.

What to do, then, to prevent the pain, possible infection and disruptions to activities that blisters can incur? Blisters develop when the upper layer of the skin is rubbed so much that it begins to separate from the lower layers. Smooth things out by filing down calluses and trimming toenails, Lipman said.

Be defensive by using paper-like tape on typical problem points or where you’ve blistered previously—between the toes, for example, or the back of the heel. Pads or padding, Lipman said, can change the way your foot fits into a shoe and abet blister formation. Make sure that your socks and shoes fit properly. Wearing two pairs of socks, a thin one inside a thicker one, can help create a protective layer.

"I pop any blister that hurts," said Lipman, "except if it’s filled with blood. That blood indicates a deep injury to the dermis." Clean the prong of a safety pin with an alcohol-soaked pad and then puncture the blister; use the pad to wipe it clean. Cover the blister with paper tape, then with another layer of stretchy tape, preferably made of cotton cloth.

Lipman said the best way to limit blister development and damage is take protective or repair measures as soon as you feel pain. “Even if you’re in a rainstorm or a snowstorm, stop,” he said. “That hot spot is a sign that you’re starting to delaminate those layers of skin.”

And once you’ve treated your blisters, he said, try to stay off your feet. Unless, of course, you’ve got a hike to finish.
Vitamin D from Page 5

System. That exposure does not need to be focused on the face, where skin cancer is more prone to appear, she said.

Swetter takes a vitamin D supplement daily. The daily recommended adult dose is 600 international units, and you don’t want to exceed 4,000 international units per day, she advised.

Recent research by Tang and her colleagues has shown that Caucasians, who are at highest risk for skin cancer, are more likely to lack vitamin D if they wear long sleeves and stay in the shade. The researchers also found that people using sunscreen are still getting enough sun exposure to produce vitamin D. They theorize—and this is backed up by independent studies—that most people don’t use enough sunscreen or reapply it often enough to significantly affect vitamin D levels.

For children, the dilemma is just as problematic. Children need vitamin D for their developing bones, but childhood burns caused by too much sun exposure have been linked to increased risk for skin cancer. Latanya Benjamin, MD, assistant professor of dermatology and pediatrics at Lucile Packard Children’s Hospital, still sees young patients who come in with sunburns. Though many parents are doing a good job in helping their kids apply sunscreen, “We are far, far from ideal,” she said.

She recommends broad-spectrum sunscreen with SPF 30–50 and having parents involve kids in the choice of brand and application style. “If children are comfortable with it, they’re more likely to use it,” she said. She also advises parents about children using sunscreens that physically block the sun through ingredients such as titanium dioxide or zinc oxide, although those products do not filter out the full range of skin-damaging UVA light.

Tang and her colleagues are now doing focused research on how to balance prevention with risk. “Some dermatologists say no sun for anybody,” said Tang. “On the other extreme are young people using any excuse to get a tan. It’s not OK to say, ‘I want to get a tan for vitamin D.’"

How does it work?

A technologist obtains consent from mothers in labor and collects the cord blood. It is then stored and shipped to Texas, where MD Anderson staff members screen the samples for infectious diseases and carry out genetic characterization. The samples collected at Packard Children’s are then entered into the international cord blood registry, becoming available to caregivers with patients in need anywhere in the world.

“We really want to encourage all our expectant mothers to consider making this altruistic donation,” Agarwal said, adding that her long-term goal is to collect donated cord blood from half of the 5,000 women delivering at Packard Children’s each year. Some patients, including those with infectious diseases such as HIV or hepatitis C, are not eligible to give cord blood, but most can donate.

Meanwhile, Agarwal is seeing first-hand the benefits of using cord blood for Packard Children’s hematopoietic- oncology patients who need stem cell transplants. “In the past year, we’ve done 10 cord blood transplants,” she said. “And this is just the beginning.”
Cancer’s aftermath

New clinic focuses on care for survivors

Janelle O’Malley has been cancer-free for eight years, following a complete hysterectomy to remove a malignant tumor. The aftermath of that surgery defines her as one of more than 12 million Americans who have had cancer. As those numbers rise, the lingering effects of the disease are fueling a new dimension of treatment—care for cancer survivors.

In February, O’Malley became a patient in the new Stanford Survivorship Clinic, one of a small but growing number of clinics nationwide where care is focused on wellness after cancer treatment.

“Our health care system is much more geared to acute rather than chronic care, and we haven’t established a good transition back to routine care,” said David Spiegel, MD, director of Stanford’s Center for Integrative Medicine and a long-time researcher on the interaction between the psychosocial and physiological impact of cancer. “People develop significant issues after cancer—the question becomes how to live with this for the rest of your life. We want to develop a program to provide emotional and medical support for people who are beyond acute care. Survivorship care should be there from day one.”

Follow-up concerns

“There’s a whole body of knowledge and, more importantly, a whole collection of needs that cancer survivors have,” said Douglas Blayney, MD, medical director of the Clinical Cancer Center, where the new clinic is located. “Some are common across tumor types and some are unique to specific tumors. We are trying to meet those needs and serve those patients.”

Care at the new clinic will focus on issues common to most cancer survivors: fatigue, anxiety, body image, sexual function and relationships. Patients first will be seen by a nurse practitioner they likely met during treatment, said nurse practitioner Kelly Bugos, RN, a clinic founder. Should a concern arise beyond those issues, patients will be seen quickly by an appropriate physician.

Initially care will focus on patients like O’Malley, who have had gynecologic cancers. “We’ve set this up so we will be seeing patients we’ve been following for quite a while, with the expectation that they are cured or have a chance for a long-term remission,” said Jonathan Berek, MD, director of the Stanford Women’s Cancer Center and an internationally known clinician and researcher in gynecologic cancers. “The focus will be on issues important to them: health maintenance, screening for other cancers and the psychological and physical adaptations for someone who has gone through the trauma of being diagnosed and treated with a life-threatening disease.”

Such patients don’t need to be seen by their oncologists, Berek said. “This is an adjunct that maximizes the quality of their care. They’ll have someone who can spend more time with them, go over tests, get them involved in support groups and pay more attention to those needs not related to a cancer recurrence.”

Stanford’s Survivorship Clinic was developed after a year of study, site visits and discussions, including some with experts from the LIVESTRONG Survivorship Centers for Excellence. Established in 2005, the network collaborates with institutions like Stanford to create nationally recognized standards and metrics of care.

On the first visit to the survivorship clinic, patients and their caregivers will work together to develop a treatment plan.

On the first visit to the survivorship clinic, patients and their caregivers will work together to develop a treatment plan. “Being diagnosed with cancer can make you feel out of control, but once you have a treatment plan, you can follow that plan,” Bugos said. “Once that treatment plan is done, you can feel out of control again, so having a survivorship plan is important.”

Ongoing research

The clinic will draw on some existing resources, including Spiegel’s decades of work on the psychosocial aspects of the cancer experience. He was among the first to show that being part of a cancer patient support group can have a significant impact on quality of life during treatment. Now he is working with Oxana Palesh, PhD, MPH, and other Stanford colleagues on research into the treatment of sleep disturbance, which occurs in 80 percent of cancer patients.

Shelli Kesler, PhD, another collaborator in Spiegel’s group, is looking at cognitive dysfunction related to chemotherapy, sometimes called “chemo brain” or cognitive fog. Researchers also are focusing on methods to treat the anxiety that can persist even after a patient is found to be cancer-free.

“The science of survival is very new—we haven’t done a lot of research—but we now have that luxury,” Bugos said. “We plan to become a program that offers the latest and best evidence-based interventions for our patients.”

As for O’Malley, “My path toward healing continues,” she said. “Once you have cancer, it embodies your spirit, your family, your friends and your future. I am extremely thankful that I am a part of the new Survivorship Clinic.”

For more information, contact the Stanford Survivorship Clinic at 650-498-6004.
When Carmen Arevalo of Palo Alto sits down with her daughter’s oncologist at Lucile Packard Children’s Hospital, she talks about her daughter’s chemotherapy treatment and its possible side effects in her native language of Spanish.

Interpreters have accompanied Arevalo on various appointments since her 12-year-old daughter, Jennifer, was first diagnosed in 2009 with rhabdomyosarcoma, a soft tissue cancer that can affect young children. Although Arevalo can speak and understand basic English, conversing in Spanish offers her a sense of comfort and enables her to more fully understand her daughter’s diagnosis and treatment options.

“When we first found out about the cancer, it was very scary for us,” said Arevalo, a native of Guatemala. “We needed to have a lot explained. Having an interpreter gives me more confidence and makes me more comfortable.”

Community diversity

Arevalo is one of the thousands of people who benefit from the interpreter services each year at Packard Children’s and Stanford Hospital & Clinics. The program began in 1971 and now has more than 50 interpreters on staff to serve the needs of the community. The demand continues to grow as the Bay Area becomes more diverse.

“Globalization is a reality. In some parts of the Bay Area, close to 50 percent of households speak a language other than English at home,” said Luis Alberto Molina, assistant director of Interpreter Services at Stanford Hospital. “Having this program in place meets a real need within our community.”

A survey of patients identified as needing an interpreter showed that more than 80 percent of respondents chose Stanford because of its interpreter services. “We have patients who drive from far away because they want these services,” Molina added.

Although face-to-face interactions are preferred, interpreters sometimes must interpret via telephone or videoconference because of the high demand for their skills. The most common languages requested are Spanish, Russian, Mandarin, Cantonese, Vietnamese and American Sign Language, as well as Farsi, Korean and Japanese. If there’s a need for a language that isn’t spoken by Stanford’s interpreters, an outside agency is used.

Interpreters also provide translation services for the hospitals so that patients can receive forms, educational materials and prescriptions in multiple languages. “When patients and their family walk through our doors, we have a system in place designed to connect them to any piece of the information that they need,” said Graciela Duperrault, manager of Interpreter Services at Packard Children’s.

Special skills

The two hospitals hold a high standard for all interpreters, who receive extensive training and are required to pass an in-house medical interpretation exam. Many of the interpreters have master’s degrees in translation, as well as degrees in the health field.

“Medical interpreters have a very complex set of skills,” said Margarita Bekker, a Russian language medical interpreter. “Linguistic knowledge is just the beginning. Interpreters also need to know complex medical terminology and meet professional and ethical standards.”

Interpreters must hear the information, retain it in short memory and then repeat it in its entirety in another language with complete accuracy. “Interpreters also have to develop an ear for all the different names of the medications, which may sound very similar,” Bekker said. “Our main role as interpreters is to be conduits to interpret everything that is said without additions or changing meaning.”

Beyond language skills, an interpreter must also be attuned to an individual’s culture and establish a sense of trust and respect. Providing comfort to patients is an aspect of the job that interpreters say is particularly rewarding. “We connect to patients through their culture as well as their language,” said Duperrault. “Patients and their families immediately identify with the interpreters. There is this rapport and immediate connection, and you sense how grateful they are.”

PhOTO: NORBERT VON DER GROEBEN

Carmen Arevalo relied on hospital interpreters to better understand treatment options for her daughter, Jennifer.