



S A N D I A

## LAB NEWS

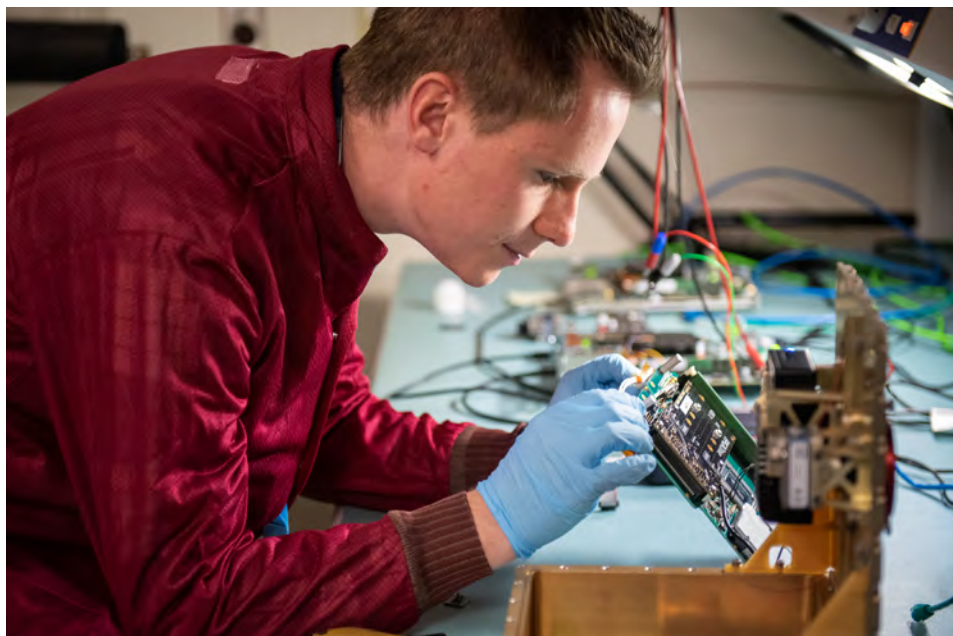
PUBLISHED SINCE 1949

Vol. 74, No. 10, June 2, 2022

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## Build-a-satellite program could fast track national security space missions



**SPACE-BOUND BOARD** — Thomas Bradshaw, electrical engineer and flight software lead, inspects a computer board for an upcoming remote sensing mission designed to demonstrate next-generation high-performance computing in space. The team used Valhalla, a Python-based high-performance computing program developed at Sandia, to quickly generate the concept design and estimate mission performance for the payload.

Photo by Craig Fritz

By Kristen Meub

Satellites equipped with remote sensing technology execute many critical national security missions, from detecting explosions to tracking sea ice, but until now it could take a team years to move from a concept to a deployable space system.

Valhalla, a Python-based performance modeling framework developed at Sandia, uses high-performance computing to build preliminary satellite designs based on mission requirements and then runs those designs through thousands of simulations. The results of the simulations feed into an interactive multidimensional video-like view of satellites executing their mission and hundreds of plots that show the user the relationship between each of the outputs and inputs at a glance. This data enables

— CONTINUED ON PAGE 4

## Secretary of energy visits the Labs

By Katherine Beherec

In her visit to Sandia last week, secretary of energy Jennifer Granholm received an overview of a wide range of mission-related work at the Labs.

"I am utterly impressed by what all your fellow scientists, researchers and technicians are doing and so grateful for your team's brilliance in executing the all-important mission," Granholm wrote in an email to Labs Director James Peery following her

— CONTINUED ON PAGE 6



**POWER BRIEFING** — From left, Sandia's Pulsed Power Sciences Center Director Dan Sinars gives a tour of the Z machine to Secretary of Energy Jennifer Granholm, Associate Labs Director Susan Seestrom, Labs Director James Peery and Deputy Labs Director Laura McGill during the secretary's visit to the Labs last week.

Photo by Craig Fritz

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### Sandia National Laboratories

Albuquerque, New Mexico 87185-1468

Livermore, California 94550-0969

Tonopah, Nevada | Kauai, Hawaii

Amarillo, Texas | Carlsbad, New Mexico | Washington, D.C.

**Katherine Beherec, Editor** kgbeher@sandia.gov  
**Alicia Bustillos, Production** abustil@sandia.gov  
**Craig Fritz, Photographer** cvfritz@sandia.gov  
**Paul Rhien, California Site Contact** prhien@sandia.gov

#### CONTRIBUTORS

Michelle Fleming (milepost photos, 505-844-4902),  
 Neal Singer (505-846-7078), Stephanie Holinka (505-284-9227),  
 Kristen Meub (505-845-7215), Troy Rummler (505-284-1056),  
 Manette Fisher (505-844-1742), Valerie Alba (505-284-7879),  
 Luke Frank (505-844-2020), Michael Langley (925-294-1482),  
 Meagan Brace (505-844-0499), Mollie Rappe (505-288-6123),  
 Skyler Swezy, (505-850-2063), Michael Baker (505-284-1085)

*Sandia National Laboratories is a multimission laboratory managed and operated by National Technology & Engineering Solutions of Sandia, LLC, a wholly owned subsidiary of Honeywell International Inc., for the U.S. Department of Energy's National Nuclear Security Administration under contract DE-NA0003525.*

Published on alternate Thursdays by Internal, Digital and Executive Communications, MS 1468

LAB NEWS ONLINE: [sandia.gov/LabNews](http://sandia.gov/LabNews)

**EDITOR'S NOTE:** Please send your comments and suggestions for stories or for improving the paper. If you have a column (500-800 words) or an idea to submit, contact Lab News editor Katherine Beherec at [kgbeher@sandia.gov](mailto:kgbeher@sandia.gov).

# DOE awards Sandia for small-business partnerships, achievements

By **Manette Newbold Fisher**

**T**he DOE Office of Small and Disadvantaged Business Utilization recently presented three awards to Sandia for exceptional engagement with small businesses.

Paul Sedillo was named Facility Management Contractor Small Business Program Manager of the Year, Sandia's Mentor Protégé Program won Mentor of the Year and Sandia protégé CeLeen LLC was honored as Protégé of the Year.

"These awards demonstrate our commitment to collaborate with small and disadvantaged businesses for the economic well-being of the nation,"

said Labs Director James Peery.

"Congratulations to the winners."

The annual **Small Business Awards Program** recognizes the outstanding performance of people and organizations that promote and expand DOE's partnerships with small businesses to help advance the department's mission. The awards focused on achievements during fiscal year 2021.

Paul was recognized for implementing strategies to increase the value of competitively awarded contracts to small businesses. He was involved in the award of Sandia's **largest subcontract** of \$700 million to New Mexico IT and telecommunications business Encantado



**TOP PROTÉGÉ** — CeLeen LLC worked with business development specialists through Sandia's Mentor Protégé Program and received a Protégé of the Year award. **Image courtesy of CeLeen**



Technical Solutions LLC. The DOE office also recognized Paul and his team for executing [quarterly forums](#) focused on small-business development and working with Sandia. In fiscal year 2021, 1,800 prospective suppliers were reached through efforts like the forums.

“I am honored to receive this award,” Paul said. “This job has enabled me to work with some of the best small and diverse businesses across the country. To know that my team and I have been able to grow these businesses, and in turn their communities, has been really great.”

During fiscal year 2021, Sandia placed three [mentor-protégé agreements](#) and exceeded all development objectives for the year, which led to the Labs receiving the Mentor of the Year award.

Paul said the Mentor-Protégé Program has been critical in growing Sandia’s supplier base with qualified and capable suppliers, maximizing opportunities for small businesses to work with Sandia and DOE in mission areas.

More than 79 mentors across all


Sandia divisions provided mentoring workshop sessions to small-business protégés.

“We have been extremely successful, not only providing exceptional development assistance for our protégés, but also leveraging the knowledge and skills of Sandia mentors to support program initiatives,” said Royina Lopez, the Mentor-Protégé Program lead. “It is great working with such a diverse group of individuals who have a passion and desire to collaboratively work toward increasing small-business participation at Sandia.”

Information technology firm [CeLeen](#), recognized as Protégé of the Year, is an [8\(a\) Small Disadvantaged Business](#) based in Perryville, Missouri. As a protégé to Sandia, the business worked closely with Labs business development specialists and is now one of Sandia’s top eight small-business information-technology suppliers that support the Informational Engineering group.

“From the first day of our mentor-protégé relationship with Sandia, we

knew that an exciting and rewarding journey was ahead of us,” said Charleen Hickey, the general manager of CeLeen. “In this journey, so far, we have had the extraordinary pleasure to work with an outstanding mentor team as well as many distinguished staff and managers from within the mission program areas. We are humbled by this award, which is truly an award to the entire Sandia team.”

The Office of Small and Disadvantaged Business Utilization annual awards program is part of DOE’s effort to continue growing its engagement with small businesses to further missions. As part of that program, Sandia seeks opportunities to work with small disadvantaged, service-disabled veteran-owned, historically underutilized business zones, or HUBZones, and women-owned small business. 



**DOE RECOGNITION** — Sandia small-business program manager Paul Sedillo was named Facility Management Contractor Small Business Program Manager of the Year by the DOE Office of Small and Disadvantaged Business Utilization.

Photo by Lonnie Anderson



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# Security space missions

CONTINUED FROM PAGE 1

the user to quickly find the solution that best executes the mission.

Valhalla has already been used to explore space systems for enhanced Arctic security, study the effects of neuromorphic computing on space system design, simulate tracking and monitoring a hypothetical refugee rescue mission in the Mediterranean Sea and other satellite missions.

James Meub, Valhalla project lead and aerospace engineer, said a multidisciplinary team typically takes months, or even years, to produce a preliminary design for a remote sensing satellite or to determine how existing satellites would perform during a new mission. The team writes mission requirements based on what the satellites will need to detect and observe, then optical engineers design the payload and aerospace engineers design a host vehicle.

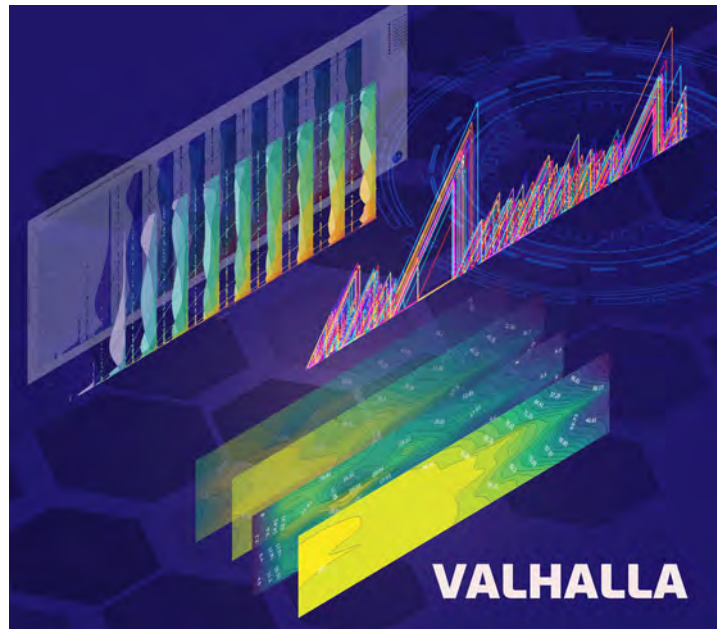
“The ability to understand how design decisions and requirements affect these simultaneous activities is iterative, time-consuming and essential to producing a reliable solution,” James said. “Valhalla short-circuits this process by using high-performance computing to help the user produce a preliminary design for a satellite or space system in weeks, and it can also show how groups of nonidentical satellites with different features will perform in new combinations and scenarios.”

Increasingly, a group of small satellites working as a system instead of one large satellite is being considered for remote sensing missions, James said.

## Customizing a satellite system to mission requirements

Designing a space system with Valhalla is similar to customizing a new car online. A project team member visits Sandia’s internal Valhalla website and selects the features and parts needed to execute the mission. The first step is to provide Valhalla with mission requirements that can be parsed into quantitative goals, including:

- Determining the level of fidelity and detail needed by specifying if the satellite system will need to detect, identify, categorize or associate objects or events.
- Selecting the class of object or event to search for, including vehicles, explosions, aircraft, boats, space debris or other satellites.



**PLENTY OF PLOTS** — Examples of plots produced by the Valhalla framework, developed at Sandia, to assist in space system design analysis.

Graphic by Johanna Hartenberger

- Selecting the frequency of data collection, or how often the system should revisit the target objects or events.
- Selecting the target’s motion model. Will the system need to observe the trajectory of trucks traveling from one location to another, or will it need to observe a city, region or neighborhood of interest, or monitor objects or events across the globe?
- Specifying any constraints. For example, the system may need to be compatible with a specific external network.
- Selecting a mission operation center to feed the images and data captured by the satellite.

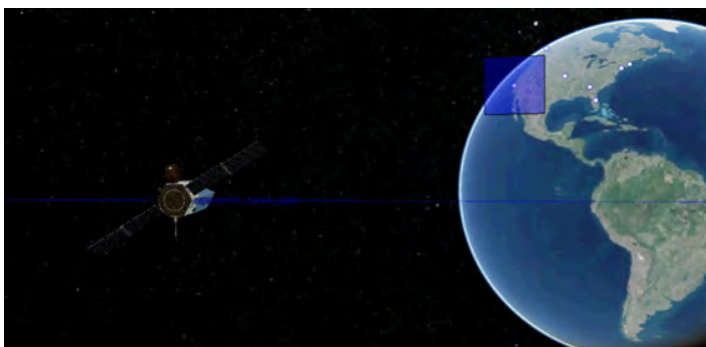
With the mission requirements clearly defined, James said the next step is to select parts such as onboard computers, radios, batteries, reaction wheels, sensors, propulsion tanks and thrusters, and GPS receivers from a component catalog with about 2,500 parts to choose from.

Valhalla takes all the selected parts and creates a baseline satellite design by using encoded interface control documents, engineering best practices and rules-based logic, he said. It sizes the payload, structure, solar arrays and batteries, optimizes the mass of the satellite and its compatibility with various launch vehicles and generates a notional layout of components internal to the satellite.

## A day-in-the-life in space

Valhalla then populates the baseline design into a group of satellites, often referred to as a constellation, and simulates the space system executing the mission by running a day-in-the-life power model simulation, James said. The simulation compares the mission performance metrics against space system goals and repeats that process thousands of times to find the best constellation design.

Valhalla also models the system’s orbital dynamics and the gravity harmonics of the earth, moon and sun to simulate the space



**ON A MISSION** — This [video](#), created by Sandia’s Valhalla program, previews a preliminary concept for a satellite performing a remote sensing mission. **Still from video by Sandia’s Valhalla program**

environment each satellite will experience over the course of the day.

James said there are thousands of variables and relationships to consider when designing a space system for a specific national security mission, making the task well-suited for high-performance computing.

“Valhalla visualizes the relationship between variables so the user can see how the overall space system is affected when parameters that are relevant to each other change,” he said. “For example, the desired altitude of the spacecraft will affect the size of the telescope needed and vice versa. As the altitude of the satellite increases, the telescope also needs to become more powerful, but

the system will need fewer satellites to provide enough sensing coverage to execute its mission.”

### Creating interactive data visualizations for decision-making

The simulation data is post-processed in a graphics processing unit cluster. The GPU takes all the data from the simulation and combs through it to correlate performance metrics across variable sets to produce an N-dimensional hypersurface that provides the user with hundreds of plots, including a 3D visualization of the constellation executing its mission, revisit and collection statistics, launch vehicle compatibility and simulated satellite telemetry feeds.

“This allows users to analyze the simulation data quickly,” James said. “All the data in a trusted, digestible format — you can see why certain simulation runs produce better performance metrics than others. This enables teams to deliver national security solutions for some projects in months rather than years.”

Valhalla has been funded through the [Laboratory Directed Research and Development](#) program, the [New Mexico Small Business Assistance](#) program, NNSA and other government organizations. [f](#)

**EDITOR’S NOTE:** James Meub is the husband of writer Kristen Meub.

# Pride Month events at Sandia

By **Stephanie Holinka**

This month, the Sandia Pride Action Network’s Pride Blitz will offer many events and opportunities to connect virtually and in person. Times may change. For more information about these events, visit the SPAN website and keep an eye out for updates in Sandia Daily News. [f](#)

#### **JUNE 6** Pride flag raising

June 6, 8:30 a.m. MDT

Meet on the west side of Building 800 to participate in raising the pride flag.

#### **JUNE 10** Decorate Albuquerque Pride Parade float

June 10, 5-7 p.m. MDT

Join SPAN members at Vail Park to decorate a float for the ABQ Pride Parade.

#### **JUNE 11** Albuquerque Pride Parade

June 11, 9-11 a.m. MDT

Join SPAN members to walk in the Albuquerque Pride Parade along Central Avenue. Meet at 9 a.m. in the line of parade floats near Girard.

**JUNE 25**

*New Mexico United Pride on the Pitch game and tailgate*

June 25, 6-9 p.m. MDT

Join SPAN and others for Pride on the Pitch. Email Chris LaFleur in advance to purchase tickets for \$29 each. Check the SPAN website for information about the pregame, family-friendly tailgate.

**JUNE 28**

*Social event at Hyder Park*

June 28, 6 p.m. MDT

Hang out with SPAN members for an informal dinner at Hyder Park in Albuquerque.

**JUNE 29**

*Trans 101/201 training*

June 29, 2-4 p.m. MDT via Teams

In this training, participants will gain a better understanding of being transgender, bust common misconceptions about transgender people and learn how to be a strong ally and advocate. Speaker Adrien Lawyer is co-director of the Transgender Resource Center of New Mexico.

**JUNE 30**

*New and Everyday Ally panel*

June 30, 9-10:30 a.m. MDT via Teams

The New and Everyday Ally panel is meant for people who are just beginning their journey as an ally. Attendees will learn how to support marginalized communities and begin to understand larger issues that impact these groups.



# Sandia and Port of Alaska sign agreement on renewable-energy, resilience research

By **Diana Hackenburg**

**A**n agreement announced recently between Sandia and the Port of Alaska demonstrates the partners' commitment to increasing energy reliability and resilience, as well as transitioning to a clean-energy economy in the Arctic.

The memorandum of understanding announced May 23 at the [ArcticX Summit](#) launches a joint evaluation of the potential for renewable-energy resources and markets for improving power systems within Alaska's Upper Cook Inlet.

The Port of Alaska, located on Upper Cook Inlet, handles half of all Alaska inbound freight. Infrastructure failures at the port increase costs and delay shipping schedules. According to the Upper Cook Inlet Marine Alliance, such failures can also lead to statewide disruptions in the distribution of fuel and freight, including food. Port officials are interested in renewable-energy and grid-modernization technologies as a pathway for improving the efficiency and resiliency of its operations, as well as for supporting new business development opportunities.

"We look forward to working with the Port of Alaska to better understand the technical, regulatory and financial challenges to improving the port's power systems and the value of exploring different renewable-energy scenarios," said Andy McIlroy, Sandia's associate labs director for Integrated Security Solutions. "Our goal is to provide reliable, actionable assessments that will allow this region to thrive as both Arctic and global conditions continue to evolve in response to climate change."


Sandia will draw on its capabilities in [renewable-energy](#)



**CLIMATE COLLABORATION** — Sandia and the Port of Alaska signed an agreement on renewable energy and resilience research.

Photo courtesy of Getty Images

[technologies](#), [microgrids](#), technology and life cycle assessment, and market analysis to identify and assess different renewable-energy deployment scenarios. This work will also build on the knowledge and experiences Sandia has gained from over 25 years of [research and development in the Arctic](#).


"The Arctic is critical for understanding and advancing climate science and security," Andy said. "Sandia sees partnerships as key for addressing the complicated issues facing this important region." 

## Secretary of energy

*CONTINUED FROM PAGE 1*

visit. "I feel honored to serve with you all."

After being welcomed by James, Granholm was briefed by Jim Handrock, director of New Mexico weapons systems engineering, on the status of Sandia's nuclear weapons modernization programs. She visited programs and activities at various facilities, including Microsystems Engineering, Science and Applications, Z machine and the National Solar Thermal Test Facility.

The secretary participated in a Hypersonics Gallery tour and presentation over lunch, then met Rep. Melanie Stansbury during her tour at the solar tower. Granholm closed out her day at Sandia with briefings on space technologies and cyber counterfeit detection. 



**TOWER TOUR** — Executives and researchers escorted Secretary of Energy Jennifer Granholm and Rep. Melanie Stansbury on a tour of the National Solar Thermal Test Facility at Sandia during the secretary's visit on May 26.

Photo by Craig Fritz

## Mileposts



Anthony Aragon 35



Paul Claassen 35



Tommy Goolsby 35



Bob Hutchinson 35



Joe Sandoval 35



Douglas White 25



Gregory Wyss 35



Lisa Barteau 20



Robert Butler 20



Kevin Lam 20



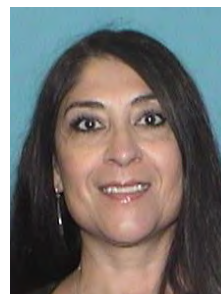
Rebecca Lopez 20



Stefanie Portillos 20



Tiffany Segura 20



Naomi Baros 15



Juan Crosby 15



Anthony Garcia 15

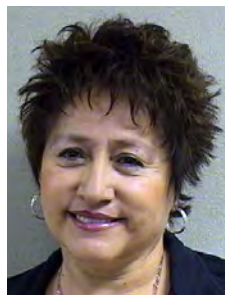


Diane Mendiola 15



Anthony Sanders 15

## Recent Retirees



Noreen DeHerrera 30

## HOMeward BOUND DRIVE

**JUNE 6 - 10**

*Helping animals find their forever home*

ANGLE, Community Involvement and the Sandia Laboratory Federal Credit Union bring you the **Homeward Bound Drive** to help homeless pets that are still looking for their forever home. Both physical items and financial donations are accepted. Details on the [Community Involvement](#) site.



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# Computer scientist draws on engineering background

*'Invest in yourself' to create new opportunities*

By **Julie Hall**

**F**or Karla Morris, the journey from her roots in Costa Rica to computer scientist at Sandia/California was marked by challenges and obstacles — and many successes. She is now Sandia's software lead for a nuclear-weapons project.

"I am so fortunate to have landed at Sandia and to have a career that constantly challenges me," Karla said. "Sandia gives you the opportunity to play with 'big-kid' toys and to collaborate with the best scientists in so many fields."

She credits her success to hard work, perseverance and an extensive support network, which includes her family, professors, mentors and colleagues. Karla recently was honored with the **2022 Black Engineer of the Year Award for Most Promising Scientist in Government**.

"I work with wonderful teammates who are so willing to share their expertise, which is essential when you work on big projects like the ones we have at Sandia. No one person can accomplish these projects on their own," Karla said.

## Discovering a love of math

Growing up in Costa Rica, Karla said her mother encouraged her to participate in drama, dance, music and visual arts. It wasn't until she joined a competitive math league at age 14 that she realized she enjoyed solving problems and had an aptitude for math.

After graduating high school, she spent a year studying electrical engineering at Tecnológico de Costa Rica before immigrating to New York to join her mother and siblings. She spent the next year learning English while working

various jobs cleaning office buildings, providing home care for seniors and teaching dance. After she passed the Test of English as a Foreign Language, she attended the Borough of Manhattan Community College, receiving an associate degree in engineering science in 1999.

Upon the suggestion of a professor, she transferred to City College of New York, graduating in 2002 as the valedictorian of the School of Engineering with a bachelor's degree. She started work at a power plant but was fired after just two days because of an immigration paperwork problem. While she worked to rectify the issue, Karla decided to pursue additional education at the suggestion of a CCNY professor. She added three degrees to her resume in the next six years: a master's and doctorate in mechanical engineering and a master's in philosophy. She also got married and had two children during this time.

## A Sandia connection

Damian Rouson, one of her doctoral advisers, introduced her to Sandia, where he was a manager in the Combustion Research Facility. She became a visiting researcher, helping develop Morfeus, or Multiphysics Object-oriented Reconfigurable Fluid Environment for Unified Simulations, a project funded by the Office of Naval Research.

In 2011, she was hired for a Combustion Research Facility staff position, during which she led the development of complex computing codes and models to enable extreme-scale simulations incorporating uncertainty. She also served as the software engineering lead for several Sandia projects.

In 2013, Karla heard about an opportunity in the Scalable and Secure Systems



**MOST PROMISING SCIENTIST** — Mechanical engineer Karla Morris joined the Combustion Research Facility in 2011 to develop complex computing codes and models to enable extreme-scale simulations incorporating uncertainty. She is now the formal methods lead for a weapons program.

**Photo by Randy Wong**

Research department and decided to pursue it. "Best decision I ever made," she said. "I was at the point where I wanted to learn something new, and this was my chance."

She learned about formal methods — proving that digital systems will behave as intended and ensuring that safety, security and reliability requirements are satisfied — and how to apply them to high-consequence systems. She became the formal methods software lead for a W80-4 warhead controller unit.



## Invest in yourself

Mentors have played, and continue to play, a major role in her career, Karla said, creating a network she has relied on during different stages of her Sandia experience. She said the best piece of advice she ever received was to always be preparing for new opportunities that might come your way.

“Invest in yourself by carving out time to learn something new that will create new opportunities for you,” she said. “Sandia management has always been supportive of this and has encouraged me to work with other departments in order to grow my career.”

“You’re allowed, even encouraged, to have a second career at Sandia. There’s no reason to be bored; you always have the opportunity to do something new,” she added. [i](#)

In the weeks leading up to Careerapalooza, a career exploration event for Sandians, Lab News is featuring staff members who have taken unusual and interesting career paths. Learn more about career mobility and opportunities at Sandia by participating in Careerapalooza events June 21-24. Visit the event website or watch for announcements in Sandia Daily News.

# National group honors Sandia Labs recruiter as veterans champion

*Efforts to connect military community to civilian employment opportunities hailed*

By **Luke Frank**

**S**andia talent acquisition specialist Tony Lona was named a **2022 Veteran Champion of the Year in Corporate America** by G.I. Jobs magazine.

The award is presented to those who champion the recruitment, hiring, retention and career advancement of U.S. military veterans in corporate America. The magazine is owned and operated by VIQTORY, a veteran-owned business that pairs veterans with corporations.

Tony is one of 30 national champions recognized for their advocacy on behalf of America’s veterans and military employees in helping to establish and grow long-term sustainable opportunities, services and programs.

“This recognition is, by far, one of the most significant honors of my professional career,” said Tony, who retired from the Marine Corps in 2014 and joined Sandia that same year. “Being trusted to support our nation’s veterans and their families as they transition from service to corporate America is truly a profound honor.”

In addition to recruiting and hiring initiatives, Tony’s advocacy work includes onboarding and mentoring programs, veteran network and affinity groups, bridging the cultural gap between veteran and nonveteran employees, recognizing and celebrating military service within the organization and working with veteran service organizations and other community groups. Award winners do not have to be veterans.

“Tony and I met through Sandia’s **Exceptional Warrior Career Development Program**, which helps combat-injured service members complete their education, enhance their skills and identify meaningful employment opportunities,” said retired Army 1st Sgt. Michael Scarlett, who joined the Labs in 2021 as a



**VETERAN ALLY** — Sandia talent acquisition specialist Tony Lona was honored as one of the 2022 Veteran Champion of the Year in Corporate America by G.I. Jobs magazine. **Photo by Erica Gomez**

deployed security professional.

“He contacted me, matched my skill sets with what Sandia needed and helped me through the interview process. Tony has a heart of gold and a real knack for what he’s doing,” Michael said.

Brian Carter, Sandia’s executive champion for the Military Support Committee and chief human resources officer, said, “Sandia values the sacrifices and contributions made by our service members in advancing our national security mission. Our recruiting programs and passionate advocates like Tony demonstrate our dedication to those who have served our nation.” [i](#)

Sandia recently marked Memorial Day with a video presented by the Labs’ Military Support Committee honoring the bravery of our veterans and their sacrifices.

[▶ WATCH VIDEO](#)

# Employee service animals perform essential duties

By **Jennifer Trotter**

In and outside the workplace, service animals perform essential duties. They are not pets. So, while most people enjoy petting a friendly puppy, any interaction with these hard-working animals could put them and their handlers at risk. Service dogs are trained to tune out distractions.

At Sandia, animals in the workplace are there to assist their handlers. All other employees are advised to simply ignore them — no petting, calling, clicking or touching their equipment. In other words, “no touch, no talk, no eye contact.”

## Meet Mags

Magnum, who also goes by Mags, is a service dog, an extension of a Sandia employee who is a more productive member of the workforce, thanks to the special relationship that they share.

“One reason I’m so passionate about increasing public knowledge and

understanding regarding service dogs is because handlers depend on them so heavily. They’re essential medical equipment and a vital part of a handler’s independence and ongoing safety,” said Mags’ handler Kate Moore, an office management assistant at Sandia. “If a service dog is injured and no longer able to work, which can happen when other animals encountered in public are not properly trained or restrained, obtaining a replacement can take years, putting the handler’s health at risk.”

Service dogs require extensive training before being placed with a handler and even more training once their working career begins.

“As examples, service dogs may be specifically trained to pick up items, give an alert about a chemical change or ensure a handler remains immobilized during a medical episode,” Kate said. “So, a distracted service dog creates a potentially dangerous situation. A missed task due to someone’s intrusive behavior could be life-threatening for the dog’s handler.”

Because service dogs travel with their handlers just about everywhere, they are expected to have perfect or near-perfect obedience and are taught to be unobtrusive and to stay out of the way. Kate also said handlers may use a wide array of different kinds of gear for their dogs. She likes a gentle leader wrapped around the dog’s nose so they can better anticipate each other’s movements.

## Meet Bear

Bear, a 4-year-old Yorkshire terrier, is a service dog at Sandia’s California campus.

“When they see me, people know that together Bear and I are a team,” said technologist Jim Holtman. “He goes with me everywhere. We share a deep bond.”

Service dogs are sometimes trained by their owners. After Jim learned techniques



**CARING COMPANION** — Magnum, or “Mags,” is an English Lab and a service dog who has been through extensive training to help his handler perform essential work duties.

Photo courtesy of Kate Moore

from an experienced trainer-handler, he became Bear’s trainer-handler. Around Sandia, Jim mostly keeps Bear on his left-hand side and walks on the left side of hallways. He finds it helpful when workforce members, whether coming toward them or passing, stay on the far side of the hallway from Bear. Doing so allows the service dog to stay focused on his work.

Jim said training the public on proper etiquette when around a service dog can be challenging.

“People will run up to Bear, thinking he can be petted or given treats like he’s just a pet dog,” he said. “My closest coworkers, however, understand and accept his role as my service dog, and because we all work in tight quarters, many hours a day, several days a week, having Bear with me reduces stress, helps keep me motivated and improves productivity, which benefits our entire team. While Bear loves interacting with people, he seems to know that when he’s wearing his vest, he’s on duty.”

## A handler’s right to privacy

Drawing attention to the handler and animal by staring, pointing or calling out is inappropriate behavior. Employees should avoid asking handlers what services their animals perform or any personal questions.

“Service dogs are now part of the Sandia workforce team,” explains Bonnie Breznik-Young, the Sandia/California absence



**SMART, HARDWORKING, HIGHLY ACCOMPLISHED** — Technologist Jim Holtman with his service dog, Bear, a 4-year-old Yorkshire terrier. Photo courtesy of Jim Holtman



management administrator. “The animal’s owner and management follow a specific process of medical determinations, agreements and accommodation discussions before the dog arrives on-site.”

Bonnie advises employees to avoid asking handlers questions or making comments, such as the following:


- Are you sick?
- Good boy or good girl.
- Why do you get to have your dog at work?
- What kind of dog is that?

In circumstances where a disability necessitates a service animal, an employee can request, verbally or in writing, accommodations from immediate management, the appropriate human resources business partner, [Employee Health Services](#) or the job accommodation specialist. The employee must then provide EHS-requested medical information and participate in discussions with management about needed accommodations.

Each service animal agreement is signed by the employee, their manager, Sandia’s occupational safety and health manager, and a physical security systems representative. An assessment will be conducted to identify any issues or concerns with accommodating the service animal. If mitigations are needed, an appropriate plan will be developed.

Concerns such as shedding and allergies are not reasons for refusing service animals in the workplace, according to the [Americans with Disabilities Act](#). In addition to being responsible for keeping their dogs groomed and brushed appropriately for the breed and the season, employee handlers must agree to apply regular flea and tick preventatives to their service animals. Moreover, a nearby employee’s allergies can be addressed by separating the workspaces. Designated pet relief and waste disposal locations will be established, and each handler is

responsible for ensuring proper cleanup and disposal.

For additional information about service animals at Sandia, contact Bonnie Breznik-Young in California or Tammy Sanchez-Godin, the New Mexico job accommodation specialist. For more general information about service animals, see the [Americans with Disabilities Act website](#). 

## What to know about service animals

**Service animals are “on duty”** and specially trained to help those they serve. Distracting them in any way may keep them from completing their job, which could be life-threatening for the person needing their help.

**Not all disabilities are visible.** Many people are accustomed to seeing service dogs with people who have visible physical disabilities. Many service animals, however, are trained to help people with conditions not always obvious to others. Don’t make assumptions about a person’s ability.

**It’s never appropriate to ask why someone has a service animal.** Doing so is akin to asking a person about their medical history.

While they may not be identified by vests, tags or any other identifying items, service animals are under the control of their handlers, who may use different types of gear. Employees also must wear accompanied-by-canine badges, which are issued by Sandia’s Medical department to indicate the service dog is approved to be on-site.

Service animals are not new to Sandia. In 2015, Sandia’s Albuquerque site welcomed a [service dog as a workplace accommodation for a veteran](#) living with post-traumatic stress disorder.



# Together We Rise

*Sandia collects supplies for wildfire responders*

**SUPPLY STOCK UP** — Sandia employees generously responded to a corporate donation request of wool socks, toothbrushes and toothpaste, personal wipes, deodorant and more to help thousands of firefighters battling New Mexico’s wildfires. While most donations were provided by local staff, employees in Nevada and California also sent items in support of the effort. Community relations specialist Roberta Rivera, who led the drive, said, “I am extremely grateful for the giving nature of employees and was amazed to see the quantity of items donated. These basic needs of firefighters are a small ask given their willingness to risk their lives for our beautiful state.” **Photo by Roberta Rivera**



# Staff plants tomatoes for food pantries



**BETTER TOGETHER** — Technologist Kevin Brenner and another volunteer worked together to plant tomatoes on a beautiful spring day in Corrales. **Photo by Bret Latter**



**EASING FOOD INSECURITY** — Sandia employees, their families and friends spent time on their weekend planting produce that will be distributed this summer to feed hungry people in New Mexico. **Photo by Bret Latter**



**SPRING PLANTING** — Tactical planner GiGi Forrest helped plant hundreds of tomato plants that will be grown to provide healthy food to people across New Mexico. Seed2Need has two gardens and an orchard located in Corrales on land donated by local property owners. Crops include tomatoes, cucumbers, watermelons, cantaloupe, green chile, green beans, squash, cabbage and broccoli. **Photo by Katrina Wagner**



**HANDS IN THE DIRT** — Office administrative assistant Mariah Apodaca volunteered May 14 to plant tomatoes with Seed2Need, a nonprofit organization dedicated to growing produce for local food pantries and soup kitchens in Bernalillo and Sandoval counties. **Photo by Bret Latter**