At Raytheon, we align our many corporate responsibility initiatives with our business strategy. As a technology leader, we have made commitments to: build a future workforce with strong interest in science, technology, engineering and math; support military families and veterans; protect people, assets and infrastructure from growing cybersecurity threats; reduce our environmental impact; and give our people and partners the opportunity, training and support they need to nurture a diverse and safe place to work and do business.
APPOROH AND STRATEGY

Raytheon is committed to open and transparent reporting, and our 2017 Corporate Responsibility Report evolves our disclosures further by introducing several important changes to our overall approach. This year we have significantly enhanced our digital report experience, providing greater flexibility in the presentation of information, and making it easier for readers to locate information.

We also included a section on cybersecurity this year, to acknowledge both its importance for securing critical infrastructure, commercial businesses and nations, and Raytheon’s responsibility to address the threat as a leader in this domain.

The result is a more accessible presentation of our corporate responsibility activities — and a clear expression of what Raytheon is doing to engineer a safer world.

SUSTAINABLE DESIGN

Raytheon is a technology and innovation leader specializing in defense, civil government and cybersecurity solutions. As such, our products and services play a vital role in protecting the sovereignty of nations and the safety and security of service members and citizens.

These trusted, innovative solutions reflect our practice of integrating sustainability into product design and manufacturing, and engineering innovation and excellence into each product’s entire life cycle. Responsible design gives us greater control over products along their entire life cycle, enabling Raytheon to enhance and improve these products to perform with greater efficiency and agility.

ENVIRONMENTAL IMPACT

Our energy, water, greenhouse gas and waste reduction programs reflect our close collaboration with stakeholders, the innovation and engagement of our people and our commitment to operational excellence. We benchmark our performance and regularly set new goals that help ensure that we minimize emissions, resources and waste within our operations.

IN 2016, WE ESTABLISHED 14 SUSTAINABILITY GOALS FOR 2020 TO KEEP US FOCUSED ON ENGINEERING A SUSTAINABLE FUTURE.
EFFICIENT OPERATIONS

As a manufacturer and systems integrator, we incorporate sustainability into our planning, decision-making and day-to-day operations. We continue to invest in new technologies that improve efficiency, reduce costs and natural resource consumption, and optimize space and employee safety within our facilities.

We’re also working with our supply chain partners to share our knowledge and best practices and encourage initiatives that improve their businesses and boost their sustainability performance.

CYBERSECURITY

As our world becomes more connected, societies face a growing and evolving threat of cyber attacks that can compromise national and personal security and disrupt critical infrastructure and business operations. Raytheon has the people and technology to make an important contribution by protecting information and infrastructure.

As we continue our pioneering work in the intelligence and defense arenas, we’re translating technologies into commercial solutions that benefit Raytheon, our business partners and the government and commercial sectors.

We also partner with government and industry to improve our collective ability to deter adversaries and maintain the strategic advantage our U.S. and allied forces currently have in today’s dynamic and challenging geopolitical environment.

DIVERSE PERSPECTIVES

We foster an inclusive environment that honors our differences, encourages the exchange of information and new ideas and makes it possible for everyone to thrive and succeed. We hone our ability to use our differences, as individuals and teams, to drive growth and take targeted actions to ensure our workforce provides opportunity for all.

This allows us to better retain and attract the world-class talent and the supplier base we need to develop the innovative solutions our global customers depend on.

SOCIAL COMMITMENT

Raytheon supports armed service members who stand in harm’s way. Our evolving economy and future prosperity depend on building a world-class workforce and a sustainable talent pipeline.

These two business imperatives focus Raytheon on two key social priorities: supporting military families and veterans, and promoting STEM education. This agenda resonates with Raytheon employees, many of whom maintain military connections through their own service or the service of family members.

This focused approach to corporate responsibility reflects not just Raytheon’s values, but also the key priorities of our external stakeholders. These shareholders, customers, supply chain partners, sustainability leaders and community partners all value corporate responsibility and participate in our success.

CONTRIBUTION FUNDING PRINCIPLE

- **MILITARY FAMILIES AND VETERANS**: 30%
- **LOCAL COMMUNITIES**: 20%
- **STEM/EDUCATION FUNDING**: 50%
MISSION AND VALUES

We advance our mission through a culture that encourages diverse perspectives, and that’s guided by our shared values.

Raytheon’s Five Core Values

We operate as one global team creating trusted, innovative solutions to make the world a safer place. Our strength comes from our diverse backgrounds and ideas; our values guide how we work together to support our inclusive culture and deliver the innovative solutions on which our customers depend. We believe our values must be lived, not read. That’s why we continue to engage our 63,000 employees on what our values — trust, respect, collaboration, innovation and accountability — look like in action. From employee-generated storytelling to leadership engagement, we ensure our values are reinforced and embedded as behaviors within the context of our work environment.

VALUES

Trust
We take pride in our ethical culture, are honest, and do the right thing.

Respect
We are inclusive, embrace diverse perspectives and value the role we all play in our shared vision.

Collaboration
We fuel more powerful ideas, deeper relationships and greater opportunities to achieve shared objectives together.

Innovation
We challenge the status quo and act with speed and agility to drive global growth.

Accountability
We honor our commitments, anticipate the needs of our customers, serve our communities and support each other.

RELATED STORIES

Agile Development:
Raytheon adopts speedy, efficient Silicon Valley methods to develop software
LETTER FROM THOMAS A. KENNEDY, CHAIRMAN AND CEO

Dear Raytheon Stakeholders,

The men and women of Raytheon are driven by a singular objective: to help engineer a safer world. How we approach this is as important as the objective itself. We strive to operate in a responsible manner and live our company values of trust, respect, collaboration, innovation and accountability. Corporate responsibility is fundamental to our business strategy. It is wholeheartedly supported at every level of our company, from Raytheon’s board of directors to the senior leadership team to our employees around the world. This report highlights our approach to corporate responsibility and the support we provide to our customers, our shareholders and the communities in which we live and work.

SECURING A CHANGING WORLD

In this age of constant and accelerating change, what we do at Raytheon, as a defense technology and cybersecurity company, is more important than ever. Allied nations rely on our missile defense systems to protect their people and sovereignty. Our satellite sensors collect precise data that helps forecasters warn the public of deadly storms. Our cybersecurity solutions protect systems we rely on, such as critical power networks and military command-and-control systems, from increasingly sophisticated attacks.

The cyber threat may be the most dynamic challenge we face. That makes cybersecurity an especially important corporate responsibility concern, because government agencies and commercial enterprises entrust Raytheon to protect sensitive data, safeguard assets and intellectual property, and keep systems up and running.

DESIGNING FOR SUSTAINABILITY

Raytheon’s operations embrace a “design for sustainability” philosophy, challenging us to reduce the environmental impact of our products and manufacturing facilities. We drive industry-leading sustainability initiatives through smart product engineering, increased system efficiency, stakeholder collaboration and employee engagement.

As a result, we are making progress on our 14 long-term sustainability goals for 2020. Achieving those goals will conserve natural resources, reduce our environmental impact, increase efficiency and reduce costs for Raytheon and our customers.
STRENGTHENING AN INNOVATIVE WORKFORCE

To be the best at what we do, we need the best people. So Raytheon is strongly focused on retaining and attracting top talent. We invest in education and career development programs to keep employees at the leading edge of their professions. We provide world-class health and wellness benefits and ensure peer-leading safety in the workplace.

And as a driver of innovation, we offer a working environment that values diversity and inclusion. When people are comfortable bringing their whole selves to work, they are more open to collaboration and the breakthrough ideas needed to solve our customers’ toughest challenges.

SUPPORTING FUTURE GENERATIONS

We are also focused on the workforce of the future, supporting impactful programs to encourage science, technology, engineering and math careers, and driving an emphasis on diversity. Our newest partnership is with Girl Scouts of the USA, through which we are encouraging girls and women to pursue STEM careers and close the gender gap.

Our strong support for the armed services helps veterans and military families discover new educational and career paths. This includes mentorship for veterans and scholarships that help them earn college degrees to position them for rewarding STEM careers.

If there was one example that demonstrated how we lived our values in 2017, it was our companywide response to the hurricanes that devastated Texas, Florida, Puerto Rico and the Caribbean. Among our many efforts, Raytheon and our people pledged more than $600,000 to help hurricane victims, and we worked in the days after Maria to bring much-needed supplies to Puerto Rico.

For all of these reasons and more, I am so proud to be a member of the global Raytheon team. Together, we are creating trusted, innovative solutions to make the world a safer place.

Respectfully,

Thomas A. Kennedy
Chairman and Chief Executive Officer
PERFORMANCE HIGHLIGHTS AND RECOGNITION

2017 RECOGNITION HIGHLIGHTS

The National Business Group on Health (a nonprofit association of 425 large U.S. employers) — Gold-level Best Employers for Healthy Lifestyles award in 2017

CR Magazine’s 100 Best Corporate Citizens — 2017

TRUE Zero Waste Certification — 7 sites

The Civic 50 — No. 1 in the Industrial sector for Civic-Minded Company

OSHA Voluntary Protection Program’s “Star” certification — 36 sites

EPA’s Green Power Partnership Fortune 500 Partners List — Top 50

Climate Leadership Award — Excellence in GHG Management

2017 Human Rights Campaign Foundation’s Best Places to Work for LGBT Equality

Student Veterans of America — 2017 Partner of the Year

EPA ENERGY STAR® 2018 Partner of the Year Sustained Excellence Award — 11th consecutive year

EPA’s Food Recovery Challenge Achievement Award

RANKED AMONG THE TOP 500 BEST EMPLOYERS IN AMERICA IN 2017 BY FORBES®

SUSTAINABILITY AWARD FROM THE ASSOCIATED INDUSTRIES OF MASSACHUSETTS

RANKED AMONG THE TOP 25 ON 2017 U.S. GREEN RANKINGS BY NEWSWEEK

NAMED AMONG 100 BEST PLACES TO WORK IN INFORMATION TECHNOLOGY BY COMPUTERWORLD® MAGAZINE FOR 11TH CONSECUTIVE YEAR
SUSTAINABILITY

4.4 PERCENT  
energy consumption reduction since 2015

12 PERCENT  
reduction in greenhouse gas emissions since 2015

3 PERCENT  
renewable energy in 2017

79 PERCENT  
waste diversion from landfills/incinerators in 2017

7 ZERO WASTE  
certified sites at the end of 2017

4 SUPPLIER  
packaging reduction projects

50 PERCENT  
sustainability goal commitments from preferred suppliers

SAFETY

29 PERCENT  
reduction in OSHA recordable injury rate from 2010

34 PERCENT  
reduction in OSHA DART injury rate (days away, restricted, or transferred) from 2010

78 PERCENT  
of Raytheon’s domestic employees work at an OSHA VPP “STAR” site

0.52  
OSHA recordable injury rate (lowest ever) in 2017

0.23  
DART injury rate in 2017

36  
OSHA VPP Sites
ALIGNING BUSINESS AND CORPORATE RESPONSIBILITY STRATEGY

At Raytheon, our business strategy aligns with our many initiatives to engineer a safer world. Our corporate responsibility strategy draws on several key areas of our business: innovation, technology and cybersecurity.

INNOVATION

By understanding our customers’ most pressing needs and working side by side with them, we focus together on initiatives that will have a tangible impact on our business, our customers’ missions, and the world we share.

Customers seek out our engineering expertise and innovative spirit to perform early-stage contract research and development that surfaces new technologies. We work as one company, sharing systems, engineering insights and vital data across Raytheon. In the process, we create value by exploring broader applications for our technologies and solutions.

This hard-earned reputation for innovation and delivering solutions has been a major growth platform for Raytheon. For example:

**Laser Technology**

Raytheon is taking aim at the threat weaponized drones present by installing high-energy lasers on Polaris MRZRs — small, all-terrain vehicles used to patrol territory. The lasers are housed in an advanced variant of Raytheon’s Multi-Spectral Targeting System™ — a sophisticated package of electro-optical and infrared sensors. We identified a clear customer need and quickly engineered a tactically relevant vehicle that could deploy to forward operating bases and perform its mission.

We also mounted an integrated high-energy laser system on an Apache AH-64 attack helicopter used by U.S. Special Operations forces. It acquired and hit an unmanned target over a wide variety of flight regimes, altitudes and air speeds. This laser technology provides warfighters with a safer, more precise way to protect themselves from new threats in the air and on the ground.
Advanced Radar

As a result of the Spectrum Pipeline Act of 2015, the Federal Aviation Administration, Department of Defense, Department of Homeland Security and the National Oceanic and Atmospheric Administration formed a cross-agency team called SENSR, for Spectrum Efficient National Surveillance Radar. The goal of SENSR is to decrease the number and types of radars across the country and replace more than 600 of them with advanced, highly sophisticated multipurpose radars for air traffic control, air defense and air surveillance, border and critical infrastructure protection, and weather forecasting. That will free up more of the spectrum needed for wireless internet services.

Raytheon is investing in this pursuit by developing a new generation of radar systems, including active electronically scanned arrays, that can improve detection rates, meet additional mission needs and decrease operations and maintenance costs.

For the FAA, new, advanced radars could improve air traffic management, increase security, and substantially lower the cost of sustainment. NOAA could benefit from more accurate, timelier weather predictions with earlier hazardous weather warnings. DHS could gain better insights to help conduct UAS and airspace security operations around suspect airborne and maritime activity. The DoD will be able to more effectively conduct homeland defense, civil support and security cooperation to secure the United States and its interests.

Quantum Computing

Researchers from Raytheon BBN Technologies completed an experiment that matched a traditional computer processor against a prototype quantum processor in a race to solve a puzzle using data intentionally packed with errors.

This early test of emerging quantum processing suggests that this technology has the speed and computing power to one day underpin machine learning, complex new medicines and more accurate radars.

These and other projects position Raytheon for long-term growth — and create new opportunities for our people as research evolves into testing and production. These innovations offer clear societal benefits, improving visibility and security while laying the technology foundation for future discoveries.
INFORMATION TECHNOLOGY

Raytheon employees and customers depend on a powerful, flexible information technology infrastructure to conduct advanced research, collect vast amounts of data, run advanced analytics and support new applications. We’re improving that infrastructure with:

**Energy-Efficient Data Centers**

We’re partnering with IBM® to bring an energy efficient “IT as a Service” approach to our enterprise data centers. We opened a new enterprise data center that incorporates solid-state storage and other energy-efficient technologies and will migrate this technology to our other enterprise data centers. This initiative will help reduce energy consumption.

We’re also gaining valuable insights we can apply to help customers upgrade their data centers. We are also working on managing server utilization in external cloud providers.

**Smart Campus**

At Raytheon’s expansive campus in Tucson, Arizona, our facilities organization is leading an initiative to integrate a network of sensors, meters, data loggers and controls that provide powerful capabilities to visualize and analyze building performance. Adopting this smart technology at this and other Raytheon facilities will help us conserve energy, reduce maintenance costs, improve productivity and minimize each building’s environmental footprint.

We’ve completed building automation system upgrades and integrated 56 buildings on the Tucson campus into the Smart Campus platform. As part of Raytheon’s Smart Campus strategy, we are upgrading building management systems at several other locations around the country for 2018 integration.

**Virtual Enterprise Collaboration**

We continue to make progress in deploying our next-generation virtual collaboration environment across Raytheon. In 2017, we worked to roll out the cloud-based integrated collaboration service globally. It provides secure email, chat, virtual meetings, and team collaboration support. We also upgraded the reliability and performance of our global videoconferencing service, which supports greater collaboration and reduces the need for employees to travel.
We’re applying decades of experience protecting our own computer systems and those of our intelligence and defense customers to build new cyber capabilities that protect critical systems and underpin our way of life.

In 2018 we will introduce a new level of cybersecurity to keep company, customer and employee data secure — and keep us one step ahead of cyber threats. We will issue new Public Key Infrastructure Smart Cards to all U.S. employees and contractors to protect our network, deliver enhanced features like a network login and provide Virtual Private Network access and wireless network connectivity.

Military and Government

We’re embedding cybersecurity protection into our entire product portfolio, from new weapons and communications systems to protection of the government systems that contain personal data and provide vital services.

The new Cybersecurity Executive Order, signed in 2017, establishes three priorities that align with Raytheon’s cyber capabilities: protecting federal networks, protecting critical infrastructure and developing a cybersecurity workforce that can defend against international cyber threats.

Commercial

Forcepoint® is meeting growing commercial sector demand for human-centric cybersecurity capabilities including risk adaptive solutions that feature data loss prevention, behavioral analytics, cloud-based security protection, next-generation firewalls, insider threat protection and cross domain products.

Raytheon is working across every side of cyber as the only company to focus its expertise on security of the converged commercial, defense, intelligence and government sectors. By investing in people, technology and education, we’re protecting society and citizens from attacks that can compromise or shut down the internet-related systems that connect us to each other and to the world.

RELATED MEDIA

VIDEO: QUANTUM COMPUTING AT RAYTHEON
CORPORATE GOVERNANCE

RESPONSIBLE LEADERSHIP

Our board of directors and senior leadership team promote integrity, accountability, transparency and the highest ethical standards. The board's public affairs committee reviews environmental stewardship and sustainability, employee health and safety, ethics, charitable contributions and community relations, and government contracting and defense procurement policies. The committee identifies and brings to the attention of the board current and emerging environmental, social and political trends and public policy issues that may affect Raytheon's business operations, performance or public image. Importantly, the committee also oversees a comprehensive program that teaches employees about ethical decision-making — and that provides them with accessible resources when they have questions or need advice.

The operation of our board and its committees has continued to evolve in line with the company's long-term strategy and ever-changing environment. Reflecting Raytheon's international growth strategy, with guidance from the public affairs committee, the company has established a world-class compliance organization designed to ensure that our export of products and services fully adheres to the laws of the United States and each of the countries where we do business. As part of the committee's focus on global operations, it also oversees a robust anti-corruption sustainment program that assures adherence to ethical standards across jurisdictions. These compliance activities, supported by a rigorous system of policies and procedures, are embedded into Raytheon's operations and align with the culture of integrity and accountability established by the board.

SHAREHOLDER ENGAGEMENT

Raytheon's commitment to promoting transparency and shareholder access is long-standing. For the last eight years, we have communicated actively with Raytheon shareholders outside of proxy season to solicit their views on governance, executive compensation and other matters. Shareholder views solicited during our outreach efforts have contributed significantly to shaping a number of governance initiatives.

Based on shareholder input, the board proactively adopted a proxy access by-law which was implemented in 2016. This measure established a meaningful process by which shareholders may, subject to certain conditions, include nominees in the company's annual meeting proxy materials.

More recently, the board endorsed an integrated reporting strategy that makes key disclosure materials more inviting, engaging and useful for all stakeholders. Our Annual Report, Proxy Statement and Corporate Responsibility Report work together to effectively communicate key information to our shareholders and other stakeholders on Raytheon's operational performance, governance and corporate responsibility initiatives. This enhanced disclosure includes a discussion of certain key topics within the context of our company's overall business strategy.

RAYTHEON'S REVAMPED APPROACH TO DISCLOSURE HAS RESULTED IN A CLEARER AND MORE ACCESSIBLE PRESENTATION OF WHAT RAYTHEON IS DOING TO ENGINEER A SAFER WORLD.
ETHICS AND ACCOUNTABILITY

Across Raytheon, transparency means holding each other, and ourselves, accountable. This commitment to ethics begins with our board and senior leadership team and extends to every employee.

We expect full adherence to our code of conduct and give employees the training and resources to understand compliance risks and regulations and to use our protected phone and online channels to speak up when they have a question or notice a problem.

We also recently introduced a stand-alone anti-retaliation policy and promoted it widely throughout our organization.

We drive the importance of integrity in all we do using video-based case studies and engagement with our employees. Our ethics program includes three key education elements that we update annually:

- **EthicSpace**: A series of award-winning videos delivered by email to all employees.
- **Act with Integrity**: Annual ethics awareness education program that presents employees with actual Raytheon cases and asks them to determine the proper course of action.
- **FCPAware 2017**: An education program to ensure employees are aware of anti-corruption issues, have the tools to identify problems and can respond in ways that protect themselves and the company.

**ETHICS OFFICE**

Employees and others may contact the ethics office at any time and may remain anonymous. They also may consult our [code of conduct](#) and our [anti-corruption policy](#) for guidance.

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<th>58,000+</th>
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<td>EMPLOYEES PARTICIPATED IN OUR ACT WITH INTEGRITY PROGRAM</td>
<td>COMPLIANCE EDUCATION MODULES COMPLETED</td>
<td>VIEWS OF ETHICSPACE VIDEOS ACROSS 30 COUNTRIES AND 43 U.S. STATES</td>
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A Culture of Compliance

The highly sensitive work Raytheon does for governments requires strict adherence to a variety of laws and regulations, including the U.S. Foreign Corrupt Practices Act and export/import regulations such as the U.S. Department of State’s International Traffic in Arm Regulations and the Department of Commerce’s Export Administration Regulations.

At Raytheon, compliance is everyone’s responsibility. It’s at the core of our corporate reputation, embedded in the work we do to protect members of the military and is critical to our growth strategy.

Anti-corruption

The Foreign Corrupt Practices Act requires strict internal controls to ensure employees, suppliers, consultants, representatives and agents comply with all applicable laws governing international business practices. This includes vetting of potential business partners and using accounting procedures to prevent concealment of bribery or other unlawful financial transactions.

Raytheon combines these controls with proactive outreach to employees in the form of required educational modules. Employees learn the ethical principles that underpin these guidelines and where to find guidance.

Raytheon shares anti-corruption best practices through its leadership of the International Forum on Business Ethical Conduct. Raytheon and IFBEC are ongoing partners with NATO’s Building Integrity program. We have helped NATO BI develop its program curriculum, shared our FCPA Aware videos and provided guest faculty speakers.

Export/Import Compliance

Raytheon takes seriously its strict responsibility to protect the nation’s most sensitive information.

We have among the largest international footprints of major U.S. defense contractors, with a current international backlog of 40 percent. This makes full compliance with international export and import control laws an important strategic concern.

To build a comprehensive and sustainable compliance program, we modified long-held practices, addressed systemic weaknesses, closed capability gaps and forged a shared organizational vision and commitment. We made large investments in resources, learning and automation.

Importantly, Raytheon’s long-term success as a leading U.S. defense contractor relies on all 63,000 of our employees to properly manage and protect all export-controlled defense articles and services required to defend and protect the United States’ warfighters and those of U.S. allies. We’ve built a robust corporate ethos that mandates and enforces adherence to all laws and regulations that are necessary to safeguard these critical national resources. Our board and senior leadership team and all managers remain committed to sustaining our robust efforts into the future.
Training and knowledge are critically important in today’s business environment — and for future generations preparing to enter the workforce. Each year, Raytheon invests in programs to help cultivate the knowledge and valuable STEM skills that can create sustainable careers for future innovators.
We’ve defined STEM education and supporting military families and veterans as key strategic business concerns and are investing in organizations and initiatives where we can help build scale and achieve well-defined outcomes. For example, attracting more women to careers in computer science and cybersecurity is important to the future of our business, and we believe the investments we’re making with Girl Scouts of the USA, Boys & Girls Clubs of America, National Collegiate Cyber Defense Competition and other organizations will advance this agenda.

As Raytheon’s international customer base expands, we’re working to help develop local workforces to support knowledge-based economies and an expanding global supply chain. Raytheon is committed to in-country knowledge exchange and community support to help develop innovators of the future in cyber and national defense.

In places like Poland and Saudi Arabia, we’re positioning STEM at the forefront of economic change. For example, we’re partnering with the Copernicus Science Centre, Poland’s largest science museum. Raytheon is the exclusive partner for the Centre’s educational FabLab, where students have access to digital manufacturing equipment like drills, soldering irons, cutters and 3-D printers. Programs like this can stimulate interest in STEM education and careers.

ENGAGING TOMORROW’S WORKFORCE

At Raytheon, technology leadership is a competitive advantage — and the key to our future. We study the leading-edge skills new generations will need to thrive at Raytheon and in our fast-changing world. These insights ensure that our customers, our company and new generations of professionals remain at the forefront of technology.

Over the last decade, our programs have helped motivate thousands of people to pursue STEM-related careers. Our widespread MathMovesU initiatives provide strong support at all levels of education to give students the inspiration and skills to succeed in these challenging and demanding positions.

MathMovesU®

Raytheon believes that hands-on, interactive learning effectively motivates middle school children from diverse backgrounds to develop the math and science skills they need to pursue STEM-related careers. For the past 12 years we’ve worked with students from elementary school through college, provided support to educators and policymakers and promoted racial and gender equality within STEM fields.

Boys & Girls Clubs of America®

Raytheon is supporting Boys & Girls Clubs of America through a $5 million, multiyear commitment to evolve its national STEM programming, part of an overall $10 million pledge to support military families and veterans. We’re building a network of STEM Centers of Innovation on or near U.S. military installations that serve a high concentration of military youth.

At the Centers of Innovation, students work with dedicated STEM staff and Raytheon mentors to develop skills and critical thinking through real-world STEM applications. They also meet new friends, develop hobbies and feel more continuity in their lives.
In 2017, Raytheon added four more Centers in Arizona, Hawaii, Utah and New Mexico and now funds programs in 13 U.S. cities and at Ramstein Air Base in Germany.

Each year the Centers connect thousands of teens from military families with interactive modules, hands-on STEM activities and technologies that include 3-D printers, robotics and high-definition video production and conferencing equipment.

**Opening STEM Career Paths for Girls**

At Raytheon, we believe that the best ideas come from diverse teams of people with different backgrounds and points of view. We’re working to attract more females to STEM fields, including careers in cybersecurity, by supporting national organizations and by encouraging Raytheon volunteers to show girls in their communities the many rewards these careers offer.

Coding is becoming an essential skill for next-generation STEM professionals, especially as more of what we use at home and work connects to the internet. In 2017, Raytheon became the inaugural sponsor of Girl Scouts of the USA’s first-of-its-kind nationwide computer science program and cyber challenge for Girl Scouts in grades 6–12.

The “Think Like a Programmer” Journey will be rolled out nationally in 2018 and has the opportunity to reach nearly half a million girls, challenging them to solve complex problems like a programmer. Girl Scouts and Raytheon will also pilot a cyber challenge at select Girl Scout councils in 2019.

Raytheon also teamed with the Southern Arizona Research and Science and Engineering Foundation to sponsor the Applied Career Exploration in Science Camp for middle school girls focused on technology and STEM skills. The six-day camp welcomed girls from low-income families, who met scientists from BRAIN STEM and visited the local air and space museum.
BOYS & GIRLS CLUBS OF AMERICA BRINGS STEM EDUCATION TO DIVERSE YOUTH

Boys & Girls Clubs of America’s network of 4,300 established Clubs gives it a strong and influential platform to serve diverse youth across America and on overseas military bases. Since 2014, its partnership with Raytheon has also enhanced its ability to engage with more young people by offering after-school programs focused on STEM education.

In 2016, Boys & Girls Clubs of America initiated a thought leadership forum that convened public and private leaders to create a road map for reaching the high percentage of military youth who live off of military bases. The organization’s “Better Together: Military Public-Private Partnership” program launched with a mission to identify “STEM-ready” military youth who are interested in pursuing post-secondary STEM related careers. With Raytheon’s support, Boys & Girls Clubs of America committed to establish dedicated STEM learning spaces in all of its Clubs and train 54,000 youth development professionals to implement a research-based STEM curriculum. In addition, in the past year Raytheon employees were among the 145 professional volunteers who added value to programming through instruction, events, experiments and software.

As part of this program, Boys & Girls Clubs of America has also teamed with the PEAR Institute at Harvard University to build the world’s largest privately held database measuring youth readiness for STEM careers. The National Youth Outcomes Initiative will report on STEM interest among youth and the efficacy of Boys & Girls Clubs of America’s STEM programming and readiness to pursue STEM careers. Preliminary results from 2016 found that 57 percent of male and 50 percent of female participants (compared with 44 percent and 16 percent respectively of their peers nationally) expressed interest in STEM careers.

Boys & Girls Club’s STEM curriculum delivers carefully designed, selected and operated programs that have been tested for quality, relevance and efficacy in its 14 state-of-the-art STEM Centers of Innovation. Individual models are tailored for each community and key learnings are shared across the network. To date, Boys & Girls Clubs of America has established STEM programming in 2,200 Clubs and has reached 950,000 youth. By 2020, it plans to expand this program to operate 22 STEM Centers of Innovation and to offer STEM education in all of its Clubs.

Raytheon endorses Boys & Girls Clubs of America’s commitment to serve diverse populations. In addition to focusing on military youth, it is also the largest provider of services to Native American youth living on native land. By extending STEM education to these young people, Boys & Girls Clubs is curating spaces for them to create, collaborate and invent.

“STEM education is a significant draw in terms of retaining and recruiting Boys & Girls Club teen members,” says Julie Teer, chief development & public affairs officer, Boys & Girls Clubs of America. “We’ve delivered this programming to nearly a million youth since launching the STEM strategy in 2015, and with Raytheon’s support we look forward to nearly tripling that number in the years ahead.”
**MATHCOUNTS**

For the past nine years, Raytheon has been the title sponsor of MATHCOUNTS, a national competition program that promotes math achievement and gives middle school students a forum to display their math and problem-solving skills.

In 2017, the program attracted more than 100,000 middle school students and more than 17,000 volunteers. Students represented 5,000 schools in 50 states, Washington, D.C., United States territories and schools serving the Defense and State Departments.

The national competition features a written round and a “Countdown Round,” a game-show format where the top 12 students compete head-to-head.

This year’s champion earned a $20,000 college scholarship. In 2017, Raytheon renewed its commitment to MATHCOUNTS through 2025, helping middle school students become creative problem solvers and develop the skills they need to become the math and science leaders of the future.

**FIRST® Robotics**

The **FIRST (For Inspiration and Recognition of Science and Technology)** Robotics Championship combines the excitement of sport with the rigors of science and technology by challenging high school students to design and build their own robots.

Raytheon sponsors more than 35 national teams every year. In addition to providing mentors and volunteers, the company annually awards $1,000 FIRST Scholarships to 40 high school seniors and college students who participate in the competition and pursue undergraduate education as STEM majors.

In 2017, six women engineers from Raytheon, NASA and the U.S. Air Force shared their personal and professional stories on a panel discussion for 100 girls from FIRST Robotics. During the Q&A session, Raytheon’s Angela Phillips advised female engineering students to “build a support group and talk about the challenges you’re each facing and help one another in overcoming them.”

More than 42,000 viewers have heard the engineers’ inspirational stories and advice from the original Facebook live stream, while many more have heard their best advice in the full video on YouTube.
Quadcopter Challenge

Raytheon UK’s Quadcopter Challenge invites high school students aged 14 and 15 to build a fully functioning quadcopter and compete in a national competition. Teams are encouraged to be creative and explore how their quadcopters are affected by changes to aerodynamics or a shift in gravity. Finalists also give a 10-minute presentation to explain their design process and how they managed their project — an experience that enables them to practice every aspect of engineering, from initial sketches to the big sales pitch.

To meet growing demand, in 2017, we expanded this program to include six regional heats. More than 250 students — more than three times the number who participated in 2016 — competed in a preliminary round. These included 40 more girls than the previous year. Sixty STEM ambassadors from Raytheon were involved in the 2017 Quadcopter Challenge, either visiting schools or coordinating the competition itself.

TEAM AMERICA ROCKETRY CHALLENGE

Each year Raytheon sponsors the Team America Rocketry Challenge — a national rocket launch competition fielded by the Aerospace Industries Association that showcases the engineering know-how of students in grades 7–12 as they compete for a place in the finals.

In 2017, the winning team from Festus, Missouri, overcame challenges from 42 teams across 28 states and traveled to Paris to take on teams from France, the U.K. and Japan. The student team won the International Rocketry Challenge by successfully launching an egg aboard a rocket they had built, guiding it to precisely 750 feet and bringing it safely to earth after a precise flight.

“It’s great to finally see what aerospace is all about,” said team member Ashton Croft after the Paris win. “The people you meet, the opportunities you have and of course the sights to see make this an experience of a lifetime.”
MathAlive!®

Since 2012, Raytheon has sponsored MathAlive!, our traveling museum exhibition that reveals math at work in the world around us — and its endless possibilities. The exhibit tours military communities in the U.S. and countries in the Middle East, inspiring young students through interactive and immersive experiences. Students learn the real math behind video games, sports, fashion, music, robotics and more.

The 5,000-square-foot exhibition includes nearly 40 unique experiences that apply math to the worlds of design, engineering, technology and science. Students learned how angles affect snowboarding, how to design a custom video game, and how to capture 360-degree selfies.

The program visited seven science centers and museums in American and international cities in 2017 and reached an estimated 400,000 visitors.

Copernicus Science Centre

Raytheon is an exclusive partner for the Copernicus Science Centre’s FabLab, Poland’s learning lab where children, adolescents and educators learn by designing and making their own constructs and models. They use digital production equipment such as 3-D printers, plotters, digital cutters and hand tools. Raytheon is also an active partner for the Robotics Workshop.

Questacon®

In 2017, Raytheon marked a decade of partnership with Questacon, Australia’s National Science and Technology Centre. Together, we are delivering interactive experiences that build interest in STEM for Australian primary and secondary school students. This year we adapted the Museum of Science, Boston’s Engineering is Elementary® program for selected schools across South Australia and the Australian Capital Territory.

The Australian trial program provides primary school teachers with a framework to deliver content aligned with the Australian Curriculum. It engages students in hands-on problem-solving through engineering solutions, with the objective of increasing students’ awareness of, and interest in, STEM subjects.
The Hall at Patriot Place

Our sponsorship of The Hall at Patriot Place helps to provide local schools with field trips where students engage in hands-on STEM activities while reliving New England Patriots history. The 20,000-square-foot exhibit space is a museum driven by technology, video and interactivity.

It promotes math and science through games and exhibits that highlight the math and science behind the game of football. These innovative attractions inspire and entertain thousands of school children and other guests each year.

National Collegiate Cyber Defense Competition

Nations around the world depend on new generations of cyber leaders to keep networks running and protect data and intellectual capital. The National Collegiate Cyber Defense Competition, presented by Raytheon, brings together college students from across the United States to test their skills at protecting an existing network infrastructure against real-world cyber threats.

Teams compete based on their abilities to detect and respond to outside threats, keep existing services such as email and web servers up and running, add or remove additional services as requested and balance security and business needs.

In 2017, students from more than 220 schools across the country showcased their defensive cyber skills. In the 10 regional contests and the national competition, Raytheon provides a variety of specialized technical resources, mentors and employee volunteers.

Cyber Academy

In conjunction with the Center for Infrastructure Assurance and Security, Raytheon hosts a Cyber Academy workshop at Khalifa University in the United Arab Emirates to introduce students to cybersecurity skills for systems and networks.
THE WORKFORCE OF THE FUTURE

Young people today seek fulfilling, meaningful work — and opportunities to contribute to important assignments that make a difference. Raytheon’s robust internship and co-op programs give students and recent grads the chance to build on their education in ways they never thought possible.

In 2017, Raytheon recruited more than 1,800 college hires, interns and co-op participants from more than 70 colleges. Raytheon’s University Programs team, campus ambassadors and employee resource groups help recruit these individuals and support their transition into the working world.

May Alotaibi, a summer intern with Raytheon Intelligence International Solutions who is completing her Ph.D. in Information Security at George Mason University, credits Raytheon with giving her real-world experience. “I came to Raytheon for professional and technical experience,” she said. “I want to learn more about how companies work together, what cyber solutions they provide, and how they design and implement solutions.”

To help young professionals transition to Raytheon, we offer networking opportunities and support through our Young Employees Success Network employee resource group. We continually evolve our total rewards program to address the benefits needs of different generations, and we’ve updated our performance development system to facilitate more streamlined and targeted feedback and recognition. We have also expanded our education assistance program to cover a greater variety of professional certifications and courses.
Service members make tremendous personal sacrifices. They put themselves on the line, miss valuable time with families and often move from base to base. When they return from service, they deserve opportunities to put their technical skills, leadership, and discipline to work through meaningful employment in the private sector.

Raytheon empowers today’s veterans through continuing education programs that prepare them for new careers. We also inspire their children to become tomorrow’s drivers of technology and innovation through programs that nurture an interest in STEM education.
SUPPORTING MILITARY FAMILIES AND VETERANS

In 2015 Raytheon initiated a five-year, $10 million partnership commitment with two organizations that are helping military families and veterans succeed. Our $5 million commitment to Boys & Girls Clubs of America provides for 22 Centers of Innovation and supports after-school STEM programming for children of military families.

Raytheon employees help plan and design these centers, which serve more than 4,000 teens — many connected to the military. In 2017, we opened four new Centers of Innovation, bringing our total to 14. These centers served 77 percent more children of military families than they did in 2016.

We also support Student Veterans of America®, the world’s largest peer network of student veterans. SVA provides critical resources and support to a veteran’s successful transition to academic life. Our $5 million partnership helps empower student veterans to reach their higher education and career goals, particularly in high-demand STEM fields.

Since 2015, Raytheon’s support has helped SVA scale to more than 1,500 campus chapters representing nearly 700,000 student veterans, an increase of 26 percent. We also supported the group’s advocacy of the Harry W. Colmery Veterans Educational Assistance Act also known as the “Forever GI Bill,” new legislation that expands veteran benefits to include STEM education and makes this support available more broadly to Gold Star families and the National Guard and Reserves.

HELPING WOUNDED VETERANS

Physically challenging activities can instill fear in disabled veterans, and addressing these fears — and connecting with fellow warriors — can change their lives forever.

For the last four years, Raytheon has teamed with the nonprofit organization No Barriers Warriors on a Veteran Wilderness Expedition that boosts their physical confidence and psychological well-being. In 2017, a team from Arizona, New Mexico, Texas and southern California, representing all branches of the armed forces, spent 10 days hiking the Wind River Range in Wyoming.

The team of 12 veterans joined experienced guides to summit the Wind River Range, Wyoming. At 13,800 feet of elevation, they watched the solar eclipse with the Grand Tetons visible in the distance.

“The issues that I face or the fears I have at home didn’t come close to what I was feeling on that mountain,” said Eddie Robles, a veteran who serves as a peer support specialist for the Department of Veterans Affairs. “To let go of that fear, start climbing and make it — it’s easily been one of the most incredible feelings of my life.”
PROVIDING PATHS TO HIGHER EDUCATION

Raytheon funds vital research on student veterans and helps mentor veterans who return to school. Our scholarships help them earn college degrees that position them for successful employment in the STEM sector.

- The Raytheon/SVA scholarships support veterans from all services who are studying cybersecurity and engineering.
- The Raytheon Patriot™ Scholarship — named after our Patriot Air and Missile Defense System — aids Army student veterans who are pursuing graduate or undergraduate degrees and demonstrate leadership in their local communities.
- The Raytheon-Zumwalt Scholarship honors U.S. Navy Admiral Elmo Zumwalt. Raytheon is a key partner in the U.S. Navy’s Zumwalt-class destroyer program.

RAYVETS EASE TRANSITION TO RAYTHEON

Student veterans at Wright State University in Dayton, Ohio, understand that veterans have powerful stories to share with future generations. As part of the Veterans’ Voices project, they’re recording hundreds of these stories to archive in the Library of Congress.

In 2017, these students taught a team from our Raytheon Employee Veterans Network how to draw out these stories, so RAYVETS can encourage even more veteran-to-veteran mentoring inside Raytheon. This mentoring helps Raytheon’s veterans make a smooth transition from military to civilian culture.
Our employees are passionate about supporting armed services members. They participate in a wide range of fundraisers and events, and many choose to align their activities with Raytheon’s two signature programs — STEM education and military family and veteran support. Many also support Raytheon’s donor-advised Fund in Support of Our Troops, which disburses grants to organizations that deliver services and support to active-duty service members and veterans.

Over the past 12 years, Raytheon employees have given nearly $1.4 million through the donor-advised fund. Fund in Support of Our Troops aids these charitable organizations:

- Air Force Aid Society
- Army Emergency Relief Fund
- Coast Guard Mutual Assistance Organization
- Homes For Our Troops
- Military Child Education Coalition
- Navy-Marine Corps Relief Society
- Operation Homefront
- Special Operations Warrior Foundation
- Student Veterans of America
- Tragedy Assistance Program for Survivors
- Veterans of Foreign Wars Foundation

RELATED MEDIA

EMPLOYEE SUPPORT TO EDUCATIONAL INSTITUTIONS TOTALED $2.7 MILLION IN 2017 — MATCHED DOLLAR FOR DOLLAR BY RAYTHEON.

RELATED STORIES

Veterans’ Voices:
Telling stories helps veterans feel understood and supported

No Barriers:
Wilderness adventure helps wounded veterans surmount obstacles and regain confidence

EMPLOYEE SUPPORT

EMPLOYEE GIVING TO EDUCATIONAL INSTITUTIONS TOTALED $2.7 MILLION IN 2017 — MATCHED DOLLAR FOR DOLLAR BY RAYTHEON.

RELATED MEDIA

VIDEO: SUPPORTING MILITARY FAMILIES AND VETERANS

VIDEO: NO BARRIERS
Raytheon’s sustainability program aligns our employees, customers, suppliers and communities around a single goal — to engineer a sustainable future by protecting the environment and conserving natural resources.

Our sustainability principles extend across our company and influence everything we do — from operating our manufacturing plants to building our products and engineering innovative solutions.
Raytheon sets ambitious targets for environmental protection and resource conservation. Raytheon is working on its second set of long-term sustainability goals. In early 2016, we established 14 sustainability goals for 2020 that address many different areas, including energy and water conservation, greenhouse gas reductions, solid waste diversion, supplier packaging, renewable energy, materials of concern and supplier sustainability commitment. Raytheon is making steady progress toward these goals. Read on to learn more about our progress. Click here to view a short vignette on the sustainability goals.

VIDEO: RAYTHEON SUSTAINABILITY PROGRAM
In early 2017, Raytheon invited employees to help develop a slogan for the Raytheon sustainability program. We sent a request for slogan ideas and received more than 100 suggestions. The Raytheon Sustainability team narrowed that list to five top ideas, and the team asked Raytheon employees to choose the top slogan. More than 2,000 employees voted, and more than 40 percent chose “Engineering A Sustainable Future.” We announced the winning slogan just after Earth Day.

We used it as we highlighted our 2017 ENERGY STAR Sustained Excellence award, and also in multimedia content to promote actions employees can take like shown in the graphic.
SUSTAINABLE ENGINEERING

DESIGN FOR SUSTAINABILITY

We integrate sustainability into our engineering processes by designing and building our products with sustainable materials and by minimizing materials of concern that pose health, safety or environmental risks. We’re especially focused on cadmium and hexavalent chromium, two toxic materials that the Department of Defense, government agencies and international organizations are working to reduce the use of.

Partnering with Customers, Universities and Suppliers on Alternatives

Raytheon has been working with universities, suppliers and standards organizations over the past several years to develop, qualify and standardize cadmium-free and hexavalent chromium-free alternatives. This is a challenging task given the high performance standards required by the many aerospace and defense products that we manufacture that operate in harsh environments.

Eliminating Cadmium and Hexavalent Chromium

Cadmium effectively protects components from corrosion, conducts electricity and improves durability. As such, it is used in a large number of aerospace and defense products, systems, and parts to treat such surfaces as the lightweight connectors Raytheon uses in many designs.

Hexavalent chromium is a compound that inhibits corrosion on metal surfaces and is commonly used in chromate conversion coatings on aluminum, zinc and cadmium. It is also added to certain paints and sealants to protect against corrosion.

Most new military contracts restrict or control the use of cadmium and hexavalent chromium compounds, and over the last several years we have made significant progress implementing alternatives. At the end of 2017, 94 percent of the materials and parts in Raytheon’s standard parts/materials list are free of cadmium and hexavalent chromium.

In 2017, we worked to eliminate cadmium-plated connectors from our standard parts list. We reduced the number of cadmium plated connectors by approximately 90 percent and marked the others as “not suitable for new designs” as we continue to seek alternatives.

Design Restrictions

Raytheon’s Engineering, Technology and Mission Assurance organization maintains a Design Guidance System. This collection of engineering design rules and guidelines includes rules that ensure reliable products and producible manufacturing.

In 2017, we introduced a new design rule relating to the use of cadmium and hexavalent chromium. It requires design engineers to explicitly describe the rationale for using one of these materials in a specified design and to describe why there is no viable alternative.

The rule also provides engineers with extensive guidance on alternative materials and processing options. There are two beneficial effects to this approach. First, no designer will be permitted to incorporate these materials without properly reviewing the alternative options. Second, this documented rationale will help us reassess prior designs as new, less hazardous options become available.
ENERGY REDUCTION

Energy reduction is a cornerstone of our sustainability program. Using less energy supports our competitive advantage goal. It also advances our sustainability vision by helping us conserve our planet’s natural resources and by reducing energy-related greenhouse gas emissions and other pollutants.

Raytheon has been a proud partner for more than 18 years in ENERGY STAR®, a voluntary U.S. EPA program that promotes strategic energy management.

SUSTAINED EXCELLENCE

For the 11th year in a row, the U.S. Environmental Protection Agency awarded Raytheon its ENERGY STAR® Partner of the Year — Sustained Excellence Award for our leadership in protecting the environment through superior energy efficiency accomplishments.

The award acknowledges our continuous reduction in energy consumption and our strong energy programs and initiatives.

Energy projects include switching to energy-efficient LED lighting; installing state-of-the-art building automation systems; upgrading central plant facilities and making improvements to compressed air systems, lab areas and production equipment; and implementing Smart Campus technologies.

GLOBAL HEADQUARTERS RECEIVES ENERGY STAR CERTIFICATION

Raytheon moved into our global headquarters building in Waltham, Massachusetts, in late 2003. Since then, we’ve continued to improve its energy efficiency by optimizing our heating, ventilation and air conditioning and boiler systems, upgrading our lighting systems and installing new technologies in our conference center.

These efforts have reduced the building’s annual energy consumption by more than 30 percent. In 2017, the building earned ENERGY STAR® Certification, becoming the first Raytheon facility to receive this recognition.

This designation is a mark of utmost efficiency, demonstrating that the building meets the EPA’s high-energy performance standards including performing better than at least 75 percent of similar buildings nationwide. Certifications such as ENERGY STAR give employees who have been working to improve Raytheon’s workspace and building efficiency well-earned recognition of their long-term efforts.
REDUCING ENERGY

Between 2008 and 2015, we reduced our U.S. energy consumption by 18 percent, saving more than 3,350 billion BTUs cumulatively. Since then, we have cut energy use by an additional 4.4 percent.

Our integrated energy management strategy spans our buildings, manufacturing processes, information technology, engineering design and communications. In 2017, we recorded a number of notable accomplishments, including:

- Advanced the implementation of Smart Campus technology
- Installed energy-efficient LED lighting
- Completed design and construction of a major energy-efficient data center
- Earned ENERGY STAR Certification of three office buildings

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<td>2016</td>
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<tr>
<td>2017</td>
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<td>3,664</td>
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DRAWING A SUSTAINABLE FUTURE

For nine years, the Raytheon facilities energy team in El Segundo, California, has used an annual poster contest to get kids thinking about ways that sustainability fosters a healthy planet. In 2017, we extended the contest to Boys & Girls Clubs in Massachusetts and in Maryland and expanded our focus to include both STEM and sustainability.

At the Boys & Girls Clubs of the Los Angeles Harbor, more than 100 children drew their visions of how STEM can create a sustainable future. Raytheon employees judged the posters on creativity and message, and the top winners in each category received prizes including Disneyland® passes, iPods® and bicycles. The drawings of the prizewinners included solar power, recycling and green technologies in their scenes of everyday life.

“The community’s economic and educational challenges are difficult,” Raytheon facilities engineer Chanea Banks said. “That’s why when companies like Raytheon provide STEM or mentoring programs, that’s such a gift. We want the children to be competitive, so the extra boost helps them in so many ways.”
RENEWABLE ENERGY

Renewable energy, or green power, is energy produced from renewable resources including solar, wind, geothermal, biogas and low-impact hydropower. Green power resources help protect human health and the environment by producing electricity without generating fossil-fuel based greenhouse gas emissions and other forms of air pollution.

TEN YEARS SUPPORTING RENEWABLE ENERGY

Raytheon has been supporting the renewable energy market for 10 years. We’ve bought or generated more than 250,000,000 kilowatt hours of renewable energy at many different Raytheon sites, including Aurora, Colorado; Indianapolis, Indiana; McKinney, Texas; Dallas, Texas; Andover, Massachusetts; and Tucson, Arizona. Since 2011 Raytheon’s Indianapolis facility has purchased renewable energy equal to 100 percent of its electricity use.

Over the last decade, our use of renewable energy has reduced our greenhouse gas emissions by a cumulative 190,000 metric tons of carbon dioxide equivalents. This equates to the emissions from 20,500 homes’ energy use for a year.

RENEWABLE GOAL

Our 2020 renewable energy goal is to increase the percent of renewable energy we buy or generate to five percent of our electricity. In 2017, three percent of our electricity came from renewable resources. In addition to Raytheon’s three onsite solar projects, the renewable energy came from wind farms in Texas and the Midwest.

SUPPORTING OFF-SITE RENEWABLE ENERGY PROJECTS

Raytheon is also supporting 13 new off-site renewable energy projects that add nine megawatts of capacity to the Massachusetts power grid. We entered multiple 20-year “solar net metering” contracts in which Raytheon agreed to purchase a large amount of the solar electricity without taking the renewable energy certificates. Raytheon’s long-term financial commitment, combined with support from local communities, made these projects possible.

ENVIRONMENTAL PROTECTION AGENCY GREEN POWER PARTNERSHIP

Raytheon is a partner in the U.S. EPA’s Green Power Partnership program. The program encourages organizations to use green power to mitigate the environmental impacts of conventional electricity. More than 1,300 partner organizations are voluntarily using billions of kilowatt-hours of green power annually. In 2017, Raytheon ranked in the top 50 on the Fortune 500 Partners List for the sixth consecutive year.
The sun is bright and hot in the deserts of Arizona. Since 2008, engineers at our large missiles factory in Tucson have been using the sun as a natural renewable energy source. The campus implemented 11 solar projects.

The largest project is a ground-mounted solar panel system that greets employees at one of the site’s entrances. We collaborated with the U.S. Air Force to develop a photovoltaic system that converts sunlight directly into electricity that powers the site. The 55 kilowatt system’s solar panels, installed in 2012, are set at perfect angles to optimize the sun’s power. Solar lights improve employee safety by lighting large parking lots, pedestrian walkways lighting and signs. Solar power also heats water at a dining center and the on-site recreation center and supplements other natural gas-fired water heaters.
GREENHOUSE GAS EMISSIONS

Raytheon is committed to help combat climate change by reducing our greenhouse gas emissions. We have measured, tracked and publicly reported our greenhouse gas emissions for the last 15 years.

We adhere to stringent greenhouse gas accounting standards and protocols including EPA’s protocols and The Greenhouse Gas Protocol published jointly by the World Resources Institute and the World Business Council for Sustainable Development.

CARBON FOOTPRINT

Approximately 90 percent of our carbon footprint comes from the energy we use. We track both our direct (scope 1) and indirect (scope 2) greenhouse gas emissions. Direct emissions come from sources we own or control and represent approximately 22 percent of our annual total emissions. The largest direct emissions come from the natural gas used to run our boilers and generators to heat buildings and power industrial processes.

The remaining 78 percent of our carbon footprint are indirect emissions from the off-site power plants that generate the electricity, heat or steam we purchase for our operations.

A third party certifies our annual greenhouse gas emissions inventory each year in accordance with the ISO 14064-3 Standard on greenhouse gas accounting and verification.

Raytheon’s 2017 U.S. greenhouse gas emissions were 392,000 metric tons of CO₂ equivalents. This breaks down into 86,000 metric tons of scope 1 emissions and 306,000 metric tons of scope 2 market-based emissions.

RAYTHEON’S CARBON FOOTPRINT, BY SOURCE

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<tr>
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<tr>
<td>Hot/Chilled Water</td>
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NASA’S SCIENTIFIC DATA SYSTEM SUPPORTS CLIMATE CHANGE RESEARCH

Raytheon has worked with NASA since 1992 on its Earth Observing System Data and Information System. The system ingests and archives earth science data and makes it available to a growing international user community that includes earth scientists, educators, governmental agencies and the general public.

The data helps scientists research and forecast the potential impacts of climate change. The data also helps governments plan and respond to natural disasters, assess natural resources and understand Earth as an integrated system. Raytheon developed and maintains the information system that manages more than three petabytes of scientific data collected from 19 instruments on 10 aircraft.

Raytheon distributes more than three terabytes of data per day to thousands of users from scientific communities around the world.
REDUCING GREENHOUSE GAS EMISSIONS

Between 2008 and 2015, Raytheon cut its U.S. greenhouse gas emissions by 28 percent, cumulatively eliminating a total of 789,000 metric tons of CO₂ equivalents. This is comparable to the electricity used in 118,255 homes for a year, or to taking 168,950 cars off the road for a year.

Since 2015, we’ve cut our U.S. emissions by an additional 12 percent, driven by our 4.4 percent reduction in absolute energy consumption. We also reduced indirect emissions from our purchased electricity significantly, as many of the electricity power plants we use lowered greenhouse gas emissions by using less coal and more natural gas and renewable resources to generate electricity.

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<th>Year</th>
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</tr>
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<td>2017</td>
<td>200</td>
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</table>

CLIMATE STRATEGY

Because approximately 90 percent of Raytheon’s greenhouse gas emissions are related to energy use, reducing energy consumption is our primary strategy for decreasing greenhouse gas emissions and doing our part to combat climate change. We continually identify and implement energy efficiency projects.

Our energy team analyzes monthly energy data, conducts energy audits, shares best practices, identifies candidate energy projects and works together to reduce consumption. This includes upgrading/optimizing HVAC systems, installing energy-efficient measures in our data centers and server rooms and installing LED lighting and making other changes to building infrastructure and equipment.

We also set annual and long-term greenhouse gas reduction targets and report progress to senior management and the public. Over the last 15 years, Raytheon’s greenhouse gas program has been recognized by the EPA, the Center for Climate and Energy Solutions and The Climate Registry.

Most recently, we received an “Excellence in GHG Management” certificate for our 2020 greenhouse gas emission goal. We also monitor and track developments in alternative energy technologies, low-carbon energy solutions and other techniques for reducing greenhouse gas emissions.

We participate in the CDP (formerly the Carbon Disclosure Project) climate change questionnaire annually. This survey addresses issues of climate strategy, climate risks and opportunities, reduction projects, greenhouse gas emissions and accounting methodologies. Our thorough responses have earned us a place in the “Leadership” category for three consecutive years.

RELATED STORIES

Engineering Better Weather Forecasts:
- Advanced weather sensors, imagery and forecasting tools help monitor dangerous storms.

An Inside Look at the Storm:
- Raytheon unmanned aircraft tracks Hurricane Maria from the inside.

Technology Helps Track Shifting Arctic Ice:
- Raytheon satellite system helps chart shifting Arctic ice.
WATER CONSERVATION

Fresh, clean water is a limited natural resource. Even though about 70 percent of the Earth’s surface is covered by water, only approximately 1 percent of it is accessible and fit for human consumption. Some parts of the world currently face water shortages, and experts predict that this problem will spread to other areas.

Although Raytheon’s industry is not water-intensive, we’ve made consuming less water a priority. Because energy and water use are connected, lower water consumption also helps us use less energy.

WATER USES

Raytheon uses water in our air conditioning/heating systems, cafeterias, restrooms and for our outdoor irrigation systems. We also use it in such manufacturing processes as parts cleaning, painting, electroplating and wastewater treatment. We strive to measure and quantify water use at each location to understand how and where we use it. This simple process can identify water waste and help us prioritize water reduction projects.

WATER REDUCTION PROJECTS

Between 2008 and 2015, we reduced U.S. water consumption by 35 percent. We’ve completed dozens of water reduction projects, which include installing low-flow plumbing fixtures in our buildings, reusing greywater for landscape irrigation, installing smart irrigation systems to reduce water used in landscape irrigation and implementing changes in our manufacturing processes.

Since 2015, we’ve maintained a consistent level of water use, despite company growth and several construction projects. We continue to identify and incorporate projects, practices and strategies. We’re currently focusing on three key water reduction areas: cooling tower enhancements, water reuse projects, and landscape and irrigation strategies.

LEADER IN WATER DISCLOSURE

Each year Raytheon publicly discloses information to CDP about our water consumption, water risks and water conservation program. CDP is a nonprofit global environmental disclosure organization that requests information on behalf of financial investment firms with combined assets under management of $100 trillion.

More than 2,000 companies worldwide participate in CDP’s program, representing $20 trillion in market capitalization. CDP issues an annual global water report that analyzes water data as well as companies’ responses regarding transparency, governance, measurement, risk assessment and goal setting. In 2017, Raytheon’s response jumped to the Leadership category, with a score of A-.

Raytheon uses Aqueduct, a water risk mapping tool from the World Resources Institute, to help identify which of our locations are in water-scarce areas. It determined that three of our locations — Tucson, Arizona; El Segundo, California; and Fullerton, California — face increased water scarcity, increasing water stress and declining water quality. We are particularly focusing on reducing water use at these locations.
WASTE REDUCTION, REUSE AND RECYCLING

ZERO WASTE CERTIFICATION

In the world of sustainability, less is usually better. In the world of waste, zero is the best. Raytheon set an aggressive goal in 2016 to obtain Zero Waste certification at 20 of our sites by 2020.

The certification program is now run by Green Business Certification Inc. This organization manages many different environmental certification programs, including the well-known Leadership in Energy and Environmental Design green building certification program.

Certification Requirements

The Total Resource Use and Efficiency Zero Waste certification requires sites to divert at least 90 percent of their waste from landfills and incinerators, and to score at least 31 out of the 81 zero waste points in 15 different categories that include redesign of processes, zero waste purchasing, upstream management and leadership involvement.

Auditors from the certifying body visit each facility to verify the information contained in the application. TRUE zero waste certified spaces are environmentally responsible, resource efficient and have low ecological and carbon footprints.

In 2015, Raytheon was the first aerospace and defense company to obtain zero waste certification. We did so at two locations at the same time: our Integrated Defense Systems headquarters in Tewksbury, Massachusetts, and our Global Headquarters in Waltham, Massachusetts. Since that time, we’ve obtained certification at five additional sites. Raytheon’s Precision Manufacturing facility in Dallas, Texas, is the most recent facility to obtain Zero Waste certification, earning it in 2017.

These sites have implemented many innovative practices to reduce waste, reuse materials, recycle waste, implement environmentally preferred purchasing practices and partner with suppliers to reduce waste.
Gold on Lemmon Avenue

Raytheon Precision Manufacturing on Lemmon Avenue in Dallas, Texas, became Raytheon’s seventh Zero Waste Certified facility in 2017, earning a gold rating. Since 2010, the site has diverted more than 90 percent of its wastes from landfill or incineration. In 2017, that diversion rate hit 96 percent.

The site is a fast-paced metal machining facility with customers and suppliers across North America. Hoppers collect all metal turnings from cutting machines for recycling. We extend the lifespan of machining coolants through a coolant recovery system that filters the coolant for reuse. Robust program and performance management, combined with employee engagement, effectively minimizes waste and develops a workforce focused on sustainability, safety and innovation.

“We scrutinize everything we throw away,” said Tyler Beauchamp, the site’s Environmental, Health, Safety and Sustainability specialist and the lead champion of the Zero Waste program. “Before 2008, the site was recycling common items like paper, wood, bottles and cans. Since then the site has found innovative ways to recycle nontraditional items like cut-resistant gloves and smocks, and to reuse materials where possible.”

Beauchamp said the support by site leadership, contractors, suppliers and employees (both past and present) made this certification possible. “There’s always more that we can do,” Beauchamp said.
DIVERTING WASTE FROM LANDFILLS AND INCINERATORS

In 2017, Raytheon achieved our highest solid waste diversion rate ever, recycling or reusing 79 percent of the wastes we generated rather than disposing of them in landfills or incinerators. We recycled or reused close to 15,000 tons of solid waste, up 27 percent from 2016.

The best way to manage waste is to avoid generating it to begin with. A strong waste management program increases business efficiency, reduces cost and is good for the environment. We continually seek ways to minimize waste throughout our facilities by evaluating waste-generating processes like shipping and receiving, manufacturing, offices, cafeteria, warehousing and grounds keeping.

WASTE DIVERSION

<table>
<thead>
<tr>
<th>Year</th>
<th>Recycled or Reused</th>
<th>Diversion Rate</th>
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<tbody>
<tr>
<td>2013</td>
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<td>2014</td>
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<td>2015</td>
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<tr>
<td>2016</td>
<td></td>
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<tr>
<td>2017</td>
<td></td>
<td>79%</td>
</tr>
</tbody>
</table>

RECYCLED MATERIALS

- **3,100 TONS** of metal
- **2,000 TONS** of single stream recycling
- **1,700 TONS** of paper and cardboard
- **1,400 TONS** of wood
- **1,500 TONS** of compost
- **1,500 TONS** of reused materials

WASTE

- **5 PERCENT** reduction of food waste as a result of dining center initiatives
- **27 PERCENT** increase in tonnage of solid waste recycled or reused as compared to 2016
- **7** Raytheon sites are Zero Waste Certified
REDUCE, REUSE, RECYCLE

We follow EPA’s Waste Management Hierarchy, seeking to reduce, reuse, or recycle materials before we consider energy recovery (incineration), treatment or landfill disposal.

We try to pursue the highest and best use of materials where possible and look for ways to extend the life cycles of materials and equipment. For example, some sites have switched from wooden pallets to durable plastic ones with longer life spans for selected uses.

Many of our sites use reusable containers for inter/intra-plant shipping of certain equipment or parts where possible, and reusable textiles (e.g., rags, absorbent mats) that get periodically laundered and reused. At a couple of our sites, our shipping and receiving personnel reuse packing materials/foam from incoming shipments in outgoing shipments.

In addition, we donate materials and equipment to schools and other nonprofit organizations on a regular basis, which is a form of “reuse.”

MAKING SUSTAINABILITY A COMPETITIVE ADVANTAGE

Sustainability leader Dimitri Shanin is always looking for the next big innovation project that will help make sustainability a business differentiator at Raytheon. In 2012 he introduced electric vehicle charging stations in El Segundo, California, an initiative that has grown to eight Raytheon Space and Airborne Systems sites with more than 130 registered users.

Today, he continues to reach across business and functional teams to drive sustainability into everything Raytheon does. He has a personal passion for sustainability and works tirelessly to develop and roll out new sustainability initiatives, and share lessons learned.

Most recently, his team initiated a Keurig® K-Cup® recycling program that has collected more than three tons of coffee grounds and K-Cup waste from nine sites. Working with an outside vendor, the team also launched the “RightCycle” program for certain hard-to-recycle items like nitrile gloves used in labs and manufacturing areas. The program takes the wastes and transforms it into material that is used in new durable goods such as patio furniture, flower pots and plastic shelving.

The team also partnered with the dining center supplier to introduce a reusable food container (“clamshell”) for take-away service in place of the existing throw-away container. Clamshells are now being expanded to many dining centers across Raytheon. “Engagement is key to sustainability excellence,” says Shanin. He established a network of over 50 Recycling Champions at two locations to drive recycling efforts and encourage employee engagement. These and other programs are conserving natural resources and helping Raytheon reduce and avoid costs.
COMPOSTING

Composting of waste is an aerobic method of slowly decomposing certain types of solid waste to produce a valuable and nutrient rich soil. As new outlets for composting open, including organic food composting, we’ve increased the amount of waste we compost.

We compost food waste from many of our dining centers and from employees’ offices. Many of our sites also compost or mulch grass clippings and yard waste generated from landscaping activities. In 2017, 25 of our facilities composted some of their wastes, and we are looking to expand the volume and the number of sites.

REDUCING FOOD WASTE

Unused food accounts for much of the trash in the United States — some 73 billion pounds annually. Wasting food also costs families and communities money, depletes natural resources needed to produce and deliver more food, and significantly increases greenhouse gases from landfills.

In 2017, the Environmental Protection Agency recognized Raytheon and our food services provider for our innovative contributions to the Food Recovery Challenge program, which two of our sites in Massachusetts joined. The program asks participants to adopt sustainable food management programs to reduce food waste, donate food where feasible before it becomes a waste and compost food waste rather than disposing of it to landfills.

The “Love Food Not Waste” awareness campaign urges employees not to overbuy and waste food. Our food service provider re-engineered cafeteria menus to minimize waste. The “Waste Not” program teaches cooks to cut vegetables and other produce with a minimum amount of waste.

Cafeteria employees track peelings and other foodstuffs daily and report them by weight in three categories: overproduction, production and out-of-date items. Our food service provider estimates that these programs resulted in a five percent reduction of food waste, which also saves them money and helps control the cost of food items to the customer. Close to 2,000 pounds of edible food was donated to local organizations from these two Raytheon sites.
SUPPLY CHAIN SUSTAINABILITY

In recent years, Raytheon has taken steps to incorporate sustainability principles into our supply chain management processes. We’ve integrated sustainability content into our source selection documents, into certain supplier assessment tools and into many of our suppliers’ quarterly business reviews. We’re working with key suppliers to ensure they are committed to our sustainability values and have sustainability goals that they pursue.

ELECTRONIC TRANSACTIONS

We continue to build platforms to allow electronic supply chain transactions that reduce environmental impact while increasing efficiency. These include agreement and procurement processes conducted in Raytheon supply chain tools such as Supplier Relationship Management, and Enterprise Purchase Order and Agreement Documentation. They also include transactions from the Raytheon Supplier Portal, which facilitates many supplier transactions associated with current contractors. We’ve also rolled out secured email processes to facilitate transmission of sensitive information to suppliers via a secured network.

SUSTAINABLE PROCUREMENT

Raytheon worked with our office supply partner to use 30 percent recycled content paper as our standard for daily printing. We’ve increased our purchases of sustainable office products — those made with renewable resources, recycled materials and/or are third party certified green.

We’re also working with our supplier to replace the polystyrene foam cups, plates, bowls and plastic utensils employees use in breakrooms and office kitchens. Instead, we’re using environmentally-preferable products that are certified compostable. We completed a pilot program at one of our large sites that, as a result of this switch, will divert an estimated four tons of waste from landfill per year. We will also significantly reduce waste contamination by making recycling easier for our employees. This initiative may also reduce annual purchasing costs by approximately five percent.
SUPPLIER PACKAGING

Raytheon is working to reduce the environmental impact of supplier packaging by decreasing packaging volume and using environmentally preferred packaging where possible. In 2017, we completed four supplier packaging reduction projects. One involved the polystyrene coolers and non-recyclable ice packs used to deliver certain frozen chemicals for manufacturing. We arranged for our chemical supplier to take back the polystyrene and ice pack bags at one of Raytheon’s large sites and reuse the materials in subsequent deliveries. This initiative will allow Raytheon to reuse, rather than dispose of, 1,100 pounds of polystyrene per year.
Cyber attacks pose risks to our organization, our people and the customers and communities we serve. For Raytheon, cybersecurity is an important corporate responsibility concern because reliable, secure data and information flow is vital to every part of a company, and for us, it is central to our ability to support our customers’ missions.
A PERSISTENT THREAT

Cyber threats are a direct challenge to our customers’ missions, as they seek to expose critical data and intellectual capital. Raytheon’s cybersecurity strategy safeguards our customers and employees from possible breaches that can erode trust. These threats also have the potential to create global security risks by disrupting power grids and critical underlying infrastructure like water, power and fuel supplies. They also can impede or halt government, military and commercial operations.

As the “internet of things” continues to expand, consumers and organizations of every size face the increased likelihood that hackers will access their information and sell it to the highest bidder — or use their connected devices to extend their reach into critical networks.

This complex challenge can’t be solved alone; solutions require multilateral leadership from governments, public companies and private institutions.

Raytheon is emerging as a world leader across every side of cyber. From power plants to unmanned aerial vehicles, from Wall Street to the Pentagon, and from around the world to here at home, our cyber solutions work at the front lines and behind the scenes to help us engineer a safer world.

RELATED STORIES

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Collaboration holds the key to “cyber hardening” and to attracting new cybersecurity professionals

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Malicious cyber attacks debilitate networks and hold users hostage

Cyber Attacks on the Power Grid:
Critical infrastructure becomes a new battleground for political and military conflicts

VIDEO: SAFER WORLD CYBER
LATEST TRENDS AND DEVELOPMENTS

Over the last decade, the cyber domain has “jumped the network” to become an information ecosystem that underpins modern life by enabling everything from shopping and driving to manufacturing and power grids.

And on a parallel path, cyber attacks have moved from individuals drawing attention and creating online mischief to complex state-sponsored attacks intended to cause economic, social and political havoc.

Cyber attacks are becoming more frequent — and more disruptive — every year, and 2017 was no exception. Cyber attacks even reached into political elections in the U.S., France, the Ukraine, Norway, the Netherlands, Germany and the U.K. And just a few weeks later, a super-charged variation of the previously discovered Petya ransomware spread across the globe, shutting down critical networks.

Hackers were also responsible for an unrelenting barrage of corporate security breaches, including one at Equifax. And an accomplished attack group used custom-built malware to breach — and possibly take temporary control of — a power company’s systems. In this environment, vigilance is more important than ever. So is transparency, allowing customers and others to protect themselves and their data.

It’s clear that cyber attacks today aim to disrupt critical systems and even manipulate the homes we live in, the water we drink, the energy we need, the cars we drive and the medical systems that support our health and well-being. Critical national infrastructure, commercial aircraft and personal health and financial data each face cyber threats. Hacking a gas turbine or nuclear facility could put systems and human safety at risk — or prevent day-to-day activities that require their power. Breaches of health records can compromise quality of care. And a major hack of a “too big to fail” global bank could bring the global financial system to a halt.
Many cyber crimes can be traced to the darknet, where hackers can purchase malware and other tools and services. There, criminals can access cyber crime support from technical experts who help criminals launch major attacks. With these tools, hackers can take full advantage of increased connectivity via the IoT, which has expanded the cyber ecosystem and made traditional cyber defense perimeters obsolete. In essence, everyone is inside the network of everyone else.

For example, threats to the IoT interfaces that control machinery and other operational technology put assembly lines, products and even consumers at risk. Companies face additional business risks from attacks to their supply chains and to the systems of business partners and acquired companies, especially as companies outsource major components like the engines that are integrated into new vehicles or aircraft.

And in the consumer sector, the IP addresses of devices like phones, household appliances, thermostats and cars have become threat points, or vectors, that bad actors can use to shut down our homes, invade our privacy, or crawl deeper into the network to reach critical infrastructure or networks.

In the never-ending quest to stay ahead of these attackers, a new approach has emerged that centers on data as it flows on a network. This change of focus from network to data combines technologies that look at threats inside a network, and the ability to understand and influence human behavior.

By understanding how legitimate users behave when they access critical systems and data, insider-focused security and continuous monitoring solutions can detect anomalies, the unauthorized activities of privileged users and determine when information has been accessed inappropriately. This approach goes far beyond simple rules and policies to generate real-time insights and behavioral analytics that recognize context and intent.

“CYBERSECURITY IS BECOMING MORE AND MORE OF AN IMPORTANT ISSUE. IT’S A MATTER OF NATIONAL SECURITY AND THE SAFETY OF OUR INFRASTRUCTURE AND OUR WARFIGHTERS.”
— Thomas A. Kennedy, Chairman and CEO

RELATED STORIES

Third Party Breaches:
New cybersecurity requirements target small suppliers, contractors and vendors
GLOBAL CHALLENGE: SAFEGUARDING NATIONS, BUSINESSES AND CITIZENS

Many of today’s sophisticated hackers are employed or supported by foreign nations and are setting their sights on strategic targets that cross national borders. By disrupting the flow of information, global shipments and government services, these attacks threaten the critical resources we rely on and our underlying stability.

As such, they create new potential avenues for global security crises, and also potentially serious economic consequences. According to Juniper Research, cyber crime is projected to cost businesses more than $2 trillion by 2019. This threat makes cybersecurity a global security imperative of the highest magnitude.

NATIONS AND GOVERNMENTS

Around the world, we’ve entered a new era where governments, commercial businesses and private institutions must evaluate their exposure to risk through a national security lens. We must assume that networks have already been compromised, and that attacks will continue to penetrate perimeters to get inside.

This escalating risk is driving aggressive actions across government and industry to build and improve cyber defenses with better visibility into networks, more tools to defend those networks and an informed workforce capable of recognizing threats.

Within the government sphere, cyber is evolving from an exclusive capability practiced in the intelligence community to a domain of operational options for our military.

The U.S. Department of Defense has taken the lead in elevating this issue, establishing USCYBERCOM, investing in cyber defense capabilities and embedding cyber operators into military units. Cyber has also become a warfighting capability that requires the new expertise to make it scalable and useable by military forces and combatant commanders.

PROTECTING GOVERNMENT ASSETS

Raytheon is working across government agencies to meet their evolving cybersecurity requirements. For the Department of Defense, we’re meeting the developing needs of the Cyber Mission Force by supporting Rapid Attack Detection, Isolation and Characterization Systems programs that look to the future of cyber as a multifaceted capability.

We’re also applying our expertise in information assurance, system-of-system integration and vulnerability assessments to help the U.S. Department of Homeland Security protect the government domain.

COMMERCIAL ENTERPRISES

In the business sector, companies face increased exposure from many angles — negligent or malicious insiders, compromised supply chains, the growing attack surface areas represented by the IoT, and the increasing number of sophisticated attackers who see businesses as easy targets. As businesses continue to invest in automation, artificial intelligence and the IoT, these cyber risks will only grow.
Commercial companies also play a critical role both in protecting their own data and in some cases developing new cybersecurity technologies. These technologies help keep valuable data, business information and intellectual property safe and ensure that critical systems are resilient and secure.

Corporate boards recognize that these cyber attacks can cost companies customers in addition to inflicting tremendous harm to brands, reputations and public trust. If intellectual property is lost, the attacks can also materially affect valuation and competitive advantage.

Boards are working to understand enterprise cyber risks, weigh investment options and establish cybersecurity goals, metrics and appropriate funding. This oversight and governance can also help with merger-and-acquisition cyber diligence, board policies for cyber risk, cyber crisis preparedness and cyber business strategy.

Businesses are also hiring cyber experts or outsourcing cyber support services. Cybersecurity service teams like those at Raytheon can be located anywhere. They dedicate the necessary time and skills to proactively hunt for attacks and quickly react when they do happen, thereby helping to ensure that organizations remain operational and secure.

A NEW CYBERSECURITY FRAMEWORK

The 2018 Defense Federal Regulation Supplement requirement, focused on cyber hardening to provide protection and resiliency, will require all Department of Defense contracts to fully comply with NIST SP 800-171.

CONSUMERS

Consumers, as individual users, are among the weakest links in the cyber defense system. At work and at home, users’ email and browsing habits on connected devices expand the attack surface and can give hackers an inside track to personal and financial data. Companies are investing in comprehensive cyber training programs to help protect their employees and their businesses.

Yet despite the amount of new cybersecurity investments, the number of serious breaches continues to rise. The public and private sectors must work with even more urgency to find those threats and learn what tactics, techniques and protocols hackers are using.

Combined, we can stop them sooner, detect them faster and then transfer that knowledge between friendly governments and across the commercial sector to close gaps attackers could exploit.
RAYTHEON SOLUTIONS

Every cybersecurity professional dreads “zero day,” the time when a security breach begins to put information, operations and people at risk. Their never-ending challenge is to stay ahead of hackers and uncover and patch flaws that create new attack risks.

Raytheon’s technologies help us engineer a safer world by protecting intellectual property and personal data while keeping business operations, critical infrastructure and government services intact.

INDUSTRY LEADERSHIP

Raytheon has emerged as an industry leader in cybersecurity. We’re playing a major role in protecting defense and civil systems and in bringing these solutions to the commercial sector.

More than a decade ago, we began developing technologies to protect our own systems. Today, we’re providing that expertise to secure customers’ networks — from companies to countries. We’re building cyber protection into products and services across our entire portfolio — from information systems, to weapons, to the systems for engaging and launching them.

Raytheon is unique in the U.S. aerospace, defense and cybersecurity sectors. We are the only company to form a holistic strategy for our interconnected world by focusing our expertise on security of the converged commercial, defense, intelligence and government sectors.

Over the past 10 years, we’ve invested heavily in building robust cyber capabilities, including the acquisition of cybersecurity specialty companies, to create a portfolio of unmatched cyber solutions for our customers:

- Robust vulnerability assessments of networks, systems and platforms/products built on decades of red-teaming experience for the most sophisticated systems.
- Support to the Intelligence Community and U.S. Cyber Command.
- Customized Virtual Security Operations Center solutions developed for nation-level defenses; these are tailored for agencies, Fortune 500 companies and high-consequence missions.
- Hardening and resilience for Department of Defense communities to help ensure new and legacy platforms can operate and succeed in the contested cyber domain.
- Cybersecurity products tested against the most sophisticated threats.
The most important decisions are based on information that above all, must be secure. From hardening defense systems against intruders to protecting critical infrastructure and data, we draw on our decades of experience to offer our customers the most effective shields against cyber threats in any domain.

We deliver these capabilities through a five-pillar approach we developed to respond to different dimensions of the global cyber threat. Our strategy aims to protect our products, protect our networks and protect our customers:

1. **UNDERSTANDING CRITICAL DOMAINS**
   - We build advanced cyber defenses into operational systems.

2. **UNDERSTANDING CYBER THREATS**
   - We analyze the means, motivations and types of cyber attacks to create security measures that protect systems.

3. **PROTECTING CONVERGED SECTORS**
   - Our technologies keep data, business information and intellectual property safe, and keep critical systems resilient and secure.

4. **MERGING HUMAN AND MACHINE**
   - We protect the intersections between people, critical data and intellectual property.

5. **HUMAN BEHAVIOR AND INTENT**
   - Our advanced research is making powerful connections between humans and machines, and building organizations that are smarter than ever.
We've put in place an updated strategic plan that addresses areas of the cybersecurity market where we believe we have an opportunity to make the biggest positive impact. Comprehensive offerings range from protection of nations, infrastructure and large enterprises to off-the-shelf software for mid-sized businesses.

Raytheon also extends these services internationally, applying our unique experience integrating and hardening large, safety-critical systems to protect nations from cyber threats. We can also tailor these nation-level cyber defenses to support international agencies, companies and high-consequence missions.

**FORCEPOINT**

Raytheon introduced Forcepoint in 2016 to transform cybersecurity for the commercial sector, global governments and critical infrastructure. Forcepoint protects enterprises, defense departments and civilian agencies by offering cyber products that lower risk, accelerate digital transformation and reduce cost.

Forcepoint’s product portfolio is focused on the human element with risk adaptive protection solutions that feature data loss prevention, behavior analytics, next-generation firewalls and security for cross-domain and cloud environments.

Raytheon continues to improve Forcepoint products through ongoing research and tests to strengthen them under pressure, leveraging the vast Raytheon networks for real-time testing. Forcepoint also provides stress-tested cyber protection to the commercial market through a technical-transfer process.

This capability makes Forcepoint the only commercial cybersecurity company with a multibillion dollar research and development arm and product test bed.
“WE CAN DO SOMETHING ABOUT THE CYBER CHALLENGES WE FACE. WE MUST BE PROACTIVE, COMMITTED AND WILLING TO WORK TOGETHER. WE MUST RE-EVALUATE OUR CURRENT MINDSET AROUND CYBERSECURITY, AUTOMATE THE TOOLS AND TECHNOLOGIES THAT PROTECT AND SUSTAIN OUR SYSTEMS, AND INVEST IN FUTURE GENERATIONS OF CYBER PROFESSIONALS.”
— Dave C. Wajsgras, President, Raytheon’s Intelligence Information and Services business

CYBER WORKFORCE AND RESILIENCY

Raytheon has assembled a group of passionate, inquisitive cyber professionals who love what they do and want to do innovative work that always pushes the boundaries within cyber. We seek talented data researchers, data scientists, security analysts and engineers.

Given the fast evolution of cyber threats, we’re committed to closing new cyber skills gaps. We’re turning to new technologies and approaches like artificial intelligence and self-healing systems that can extend the reach of the expert. We also are engaging firsthand with universities and other organizations to help educate students and grow their interest in becoming cyber professionals.

Employee development is another priority, and we’re ensuring they can operate effectively in the cyber domain as they interact with information technology and critical data. Building our employees’ skills and online behavior helps to protect them and the systems and data we rely upon.

- Raytheon offers qualified employees the opportunity to advance their educations through the Cyber ELITE — Exceptional Leadership in Technology program. Participants develop cybersecurity skills through a full-time, formal advanced education program with partner universities. Raytheon’s Cyber Advanced Study Program provides a pathway for employees to earn a cyber certificate, master of science or doctoral degree in the fields of engineering or computer science.
- Raytheon conducts an annual “RTN Secure Week” with tailored videos, intranet blogs and in-person presentations on a variety of cybersecurity topics. This focused program helps employees improve their cybersecurity awareness and usage behaviors — keeping themselves and the networks they use more secure.

ATTRACTION WOMEN TO CYBERSECURITY

Valecia Maclin, Raytheon’s cyber program director, knows how tough it can be for women to gain traction in her field. Women account for just 10 percent of the cyber workforce, and it can be hard to find mentors to share tips and tricks of the trade. Valecia’s own experiences — and her passion for cybersecurity — motivate her to give girls and young women a helping hand. She volunteers at the annual National Collegiate Cyber Defense Championship, a Raytheon-sponsored event that challenges college students from across the country to test their skills at protecting a network against cyber threats.

She also works with educators and nonprofit organizations that help middle- and high-school girls to find opportunities in STEM.

“As a hiring manager, I seek out women,” Valecia said. “They bring with them a different perspective and a diversity of thought that’s critical in defending networks.”

Valecia Maclin
EDUCATION INITIATIVES

Raytheon’s success will depend on cultivating future generations of cyber defenders. As software becomes the backbone of every product, platform, appliance and vehicle — and as every company incorporates cyber in their business functions — the demand for expertise will grow exponentially.

Today, the rise of sophisticated threats continues to outpace cybersecurity training and the growth of the talent pipeline. There is a serious need to attract and train curious analysts who understand networks and can effectively protect network perimeters, script and identify endpoints.

We help develop this talent by investing in programs that encourage young people to pursue STEM careers. We also form research partnerships with universities to develop new cyber technologies. These relationships include research internships that expose students to cyber engineering.

We also fund many other cyber education initiatives, including:

- The National Collegiate Cyber Defense Competition, where teams of college students compete to protect their networks against external threats.
- The Cyber Security Challenge, an event series in the U.K. that tests amateur applicants with cyber skills.
- Raytheon’s Cyber Academy, a global cyber education program for students, first launched in the United Arab Emirates.
- An annual global research study, Securing the Future: Closing the Cyber Talent Gap, to identify trends and help to educate the millennial generation about cybersecurity careers.
- The Raytheon Women’s Cybersecurity Scholarship, administered by the Center for Cyber Safety and Education, to encourage more women to enter this field.
- The National Cyber Security Alliance board and promotion of National Cyber Security Awareness Month to educate young people about cybersecurity careers.
- Collaboration with Girl Scouts of the USA to deliver a first-of-its-kind nationwide computer science program and cyber challenge with the opportunity to reach nearly half a million girls in grades 6–12.
A MORE RESILIENT SUPPLY CHAIN

Raytheon’s cybersecurity expertise makes us a valuable supply chain partner. We draw on our capabilities to share best practices and alert partners to potential security threats. The collaborative environment we’ve built enables us to protect and share technical data. We can also quickly alert our supply chain if we detect a threat to a supplier’s network.

Suppliers also agree to notify us if they experience a breach, and we work with them to determine its impact and meet disclosure requirements.

We also collaborate with other large defense industry suppliers in the Exostar Exchange. This secure, automated system gathers demand signals from other manufacturers; exchanges supplier documentation electronically to streamline and simplify that process; and generates advance shipping notices, invoices and other documents.

The Exchange also collects data on cybersecurity performance. Monthly meetings enable us to share forecasts, collect feedback and discuss ways to update the platform to make it more user friendly for suppliers.

Raytheon is working to build internal and external strategic relationships to boost cybersecurity and overall performance. Improved collaboration between our Supply Chain, Engineering, Finance, Logistics and Information technology teams will enable us to collect more and better data on the security of the supply chain and economic universe.

We can then share relevant industry information across our diverse supplier community. A new, streamlined Enterprise Supplier Data Management strategy and system enable Raytheon’s four lines of business and Forcepoint to manage our suppliers using one platform within a common SAP® business software environment.
Raytheon builds and maintains a global workforce of talented, motivated and inquisitive people. We stand out by offering employees far-ranging and industry-leading opportunities to do noble work that helps make the world a safer place.

We also champion a culture of collaboration that focuses on customer success. We support our people by fostering a diverse and inclusive culture, investing in education and career development programs that keep employees at the leading edge, providing world-class health and wellness benefits and ensuring a safe and secure work environment.
WORKFORCE DEMOGRAPHICS

- Female: 26%
- People of Color: 28%
- Veterans: 17%
- Baby Boomer: 40%
- Gen X: 34%
- Gen Y: 25%
- Traditionalist: 1%
ATTRACTING, RETAINING AND DEVELOPING TOP TALENT

Raytheon recognizes that talent is our competitive advantage — and the key to our success. Our people design and build the groundbreaking technical products and processes that support our customers’ needs and help make the world a safer place.

We support career development for all Raytheon employees and continuously review and enhance our programs to better attract, retain and develop our talent.

ATTRACTING TOP TALENT

Each year, tens of thousands of newly minted engineers with diverse backgrounds and perspectives join the ranks of professionals who use their problem-solving skills to address the great challenges of our day. At Raytheon, they can explore countless opportunities, from securing a cyber safe world, to pushing the boundaries of weather forecasting, to supporting human spaceflight.

Leading colleges and universities provide a conduit to inquisitive, motivated people who can bring new ideas and methodologies that contribute to Raytheon’s innovation pipeline. To attract new generations of talent, we invest in advocacy and leadership work at U.S. and international campuses that connects recruiting, research, learning and branding.

These programs help us learn about leading-edge research and identify professors and recent graduates who can offer extensive technical experience and diverse perspectives.

COLLABORATIVE RESEARCH

Raytheon has developed multifaceted relationships with research universities that operate at the forefront of technology. These include Northeastern University, the University of Massachusetts, Massachusetts Institute of Technology, the University of Arizona and the University of California-Los Angeles.

We provide funding and technology expertise to help advance promising research, and our engineers collaborate with professors and students.

As lead sponsor for the new Center for Autonomous Systems and Technology, or CAST, we’re investing in research on autonomous systems that are critical for the aerospace and defense industry.

The 10,000-square-foot lab at the California Institute of Technology is advancing the science of bio-inspired systems and autonomous technologies like drones. It includes an assembly room with an 85-foot track for walking robots, an aerospace robotics control lab and a three-story, enclosed aerodrome for testing drones.

Dozens of researchers and scientists from Caltech and the Jet Propulsion Laboratory are working on directed topics of high interest to Raytheon, including autonomous navigation, artificial intelligence, machine learning, machine vision, hypersonics and communications.

Raytheon has assembled a team of senior engineers to adapt CAST-developed technologies for new and exciting applications. As part of the sponsorship, Caltech graduate students and researchers may participate in work performed at Raytheon.
STRATEGIC TALENT MANAGEMENT

Raytheon benefits from the talent, skills and experience of many exceptional people who have devoted their entire careers to our mission. But as these senior leaders near retirement, and as our business strategy continues to evolve, we must ensure our talent pipeline can support our future growth.

As the generational mix of our workforce continues to shift, we are analyzing data related to work preferences, expectations for growth and development, and many other factors that we use to inform the changes we make and plans going forward. We are also constantly assessing how new technology like artificial intelligence can support our business and talent strategies.

In 2017, we developed a new strategy to identify and prepare candidates as successors to key organizational roles. We created experiential grids for 30 roles, including 10 vice president positions who report directly to our senior leadership team. These profiles define very specifically what experiences people need to cultivate to become candidates.

These are just some of the ways we continue to adapt how we attract, develop and motivate people as the talent landscape changes.

BUILDING TOMORROW’S TECHNOLOGY

As an advanced technology leader, Raytheon needs to place its brightest talent on the very frontier of innovation. So we’re giving young engineers early opportunities for recognition at our Innovation Center, Immersive Design Center and Fusion Innovation Lab in Tucson, Arizona.

The centers foster an open, collaborative culture where employees feel comfortable experimenting and taking calculated risks to solve some of our industry’s most challenging problems. Employees gain inspiration by working with robots, virtual reality, optics, new manufacturing techniques and more.

In 2017, software engineers Desone Burns, Amritpreet Kang and Mel Hernandez won the Innovation Center’s Hackathon competition by building an automated drone that detects and tracks people’s faces. The three-day Hackathon allows employees to develop an idea outside their regular jobs, using company-provided hardware. Many of those ideas go on to earn patents.

“Coming straight out of college, you want to make an impact, but you don’t expect it will happen so quickly,” said Kang, a guidance, navigation and controls specialist who works on Raytheon’s Exoatmospheric Kill Vehicle program. “The work we do has a big impact, especially on the people we’re protecting here and around the world — and our service members abroad.”
SUPPORTING CAREER DEVELOPMENT

Success in business requires a deep understanding of employee aspirations and a commitment to invest in their success. We provide leadership development opportunities for high-potential employees early in their careers, followed by mid-level and executive training programs.

Every qualified candidate needs to be able to envision a career for themselves at Raytheon. We’re committed to increasing representation of women and people of color in the leadership pipeline and are making meaningful progress through a series of strategic activities.

We’ve improved the way we slate, select and onboard employees and have aligned our development process with diversity-focused goals. And our focus on employee sponsorship and mentorship is helping people build networks and connect with mentors and advocates.

In 2017, every member of Raytheon’s senior leadership team served as a sponsor to protégés to build relationships, advocate placements and support talent in key roles. Leadership’s engagement is improving retention and leading to meaningful role changes and promotions across business functions.

We also maintain and evolve a rich set of individual development and team development resources to address the needs of our 63,000 employees. These include a development planning framework, a Global Mentoring Program and leadership courses and assessments. We also keep communication channels open across Raytheon to monitor the heartbeat of our organization. We track workforce sentiment through our employee resource groups, workforce surveys, blogs and social media.

FOLLOWING HER OWN FOOTSTEPS

During her childhood, Raytheon chief engineer Katherine Herrick would sit in on engineering classes taught by her father Don, a professor at Texas A&M University.

Those early experiences helped give her the confidence to pursue advanced degrees in engineering at the University of Michigan and to land a job at Raytheon in 2001. Eleven years later, Don brought his expertise in radar and electro-optical systems to Raytheon.

Katherine began her career doing research-level work focused on amplifiers, antennas and array architectures. She has five U.S. patents and more than 50 technical publications.

She has also led panel sessions on Women in Engineering at the past two Institute of Electrical and Electronics Engineers International Microwave Symposia and serves on the board of her alma mater’s Electrical and Computer Engineering Council.

Recently, Katherine joined Raytheon’s engineering elite as senior engineering fellow.

NEARLY 500 EMPLOYEES COMPLETED RAYTHEON LEADERSHIP DEVELOPMENT PROGRAMS IN 2017.

IN 2017, EMPLOYEES RECEIVED AN AVERAGE OF 21.3 HOURS OF TRAINING.
RETAINING TALENT, ADVANCING LEADERSHIP SKILLS

Raytheon employees have a thirst for doing great and interesting work that directly impacts the world around them. This shared purpose is reflected in our biannual employee survey results. Our most recent survey revealed that Raytheon once again outperformed the majority of other high-performance companies that benchmark these categories in their employee surveys.

In 2017, Forbes® ranked Raytheon among the Top 500 Best Employers in America, and we were named among 100 Best Places to Work in Information Technology by Computerworld® magazine for the 11th consecutive year. We were also named among the 100 Best Corporate Citizens by Corporate Responsibility Magazine®.

ENCOURAGING SELF-DRIVEN LEARNING

Raytheon offers a variety of education and training programs, accessible through an online learning management system. To facilitate self-driven learning, we align these courses with specific competencies. Other modules focus on such functional areas as engineering, contracts, supply chain and sustainability. Additionally, Raytheon’s U.S. Education Assistance program offers tuition reimbursement for a variety of degree and non-degree programs.

EQUAL WAGES FOR EQUAL WORK

Employees value Raytheon’s long-standing commitment to equal pay for equal work. We conduct regular pay equality audits and are also subject to fair-pay rules that apply to federal contractors.

RECOGNIZING PERFORMANCE

Raytheon provides a variety of recognition programs to acknowledge employee contributions. Our Rstars program is a global, online platform that gives all Raytheon leaders and employees an easy and consistent way to show thanks and appreciation to colleagues in both monetary and non-monetary forms.

“Recognizing and awarding employees is a great way to motivate each other,” says IDS employee Liz Lusky. “Rstars helps build a company culture where people want to work hard, contribute and succeed.”

In 2017, nearly 46,000 employees used Rstars to send more than 101,000 recognitions to each other, with over half of those tied to our company value of collaboration. Additionally, Raytheon invested nearly $50 million in Rstars awards, including nearly $4 million in Spot Awards, nearly $43 million in Achievement Awards and more than $3 million in Service Awards globally.

IN 2017, RAYTHEON INVESTED NEARLY $50 MILLION IN RSTARS AWARDS.

RELATED STORIES

- Young Engineers: Arizona desert delivers balance, affordability for young Raytheon engineers
- Tech Jobs: Engineers choose defense contractors over Silicon Valley tech companies
DIVERSITY AND INCLUSION

We are at our best when different perspectives and experiences energize our environment. That’s why diversity and inclusion are at the center of who we are and how we deliver the innovative solutions on which our global customers depend. It comes to life in our efforts to attract, develop and retain employees, nurture and partner with our small and diverse suppliers and deliver programs that provide opportunity in the communities we serve.

We formalized our Diversity & Inclusion initiative in 2000, and it has significantly strengthened our culture.

In 2017, we deepened this commitment through a number of initiatives, including comprehensive efforts to broaden representation of women and people of color, especially in leadership positions. We also launched Diversity 2020, an employee engagement campaign backed by Raytheon’s senior leadership team. And we announced Raytheon’s ninth executive diversity champion, Wes Kremer, Integrated Defense Systems business president.

LEADING FROM THE TOP

Raytheon’s commitment to diversity and inclusion starts at the top, with an actively engaged leadership team that’s spearheading a strategic, multiyear plan to improve diversity and inclusion. The plan incorporates researched, process- and culture-focused efforts to address the imperative to cultivate a richly diverse and inclusive workforce.

Our strategy focuses on nurturing an inclusive environment that honors our differences, developing these differences to drive growth, and ensuring that our workforce reflects the customers and communities we serve. It affects how we source candidates for employment, how we identify and develop high performers, how we evaluate employee contributions to the company and how we are driving leader responsibility and accountability.

Specific actions include revamped talent acquisition and development processes; required training on topics like unconscious bias and inclusive leadership; diversity-related annual goals; and the Diversity 2020 communications campaign to drive conversation and action around fostering a diverse and inclusive environment.
A CULTURALLY COMPETENT WORKPLACE

We work every day to foster an inclusive and culturally competent workplace that embraces all our differences as opportunities to expand global growth, build competitive advantage and drive collaboration. We’ve achieved these objectives by focusing on three primary areas:

LEARNING
We embed diversity content into our education and development programs to evolve our collective thinking about how a diversity of ideas requires a diversity of thinkers.

EXPERIENCE
We give current and future leaders the exposure and experience they need to cultivate a global and inclusive mindset.

DIVERSITY
We rely on a diverse workforce to help us collaborate on innovative solutions that meet the needs of our customers — both domestic and our growing global customers.

As we engage our global customers, we strive to understand what diversity means within different cultures and how we can most effectively harness and integrate diverse ways of thinking. We develop focused learning initiatives to ensure that our global workforce accurately understands and represents the markets where we operate.

Our Country Foundation Briefs series, developed in partnership with our global business development team, serves as a valuable resource to better understand the cultures and business environments of our global growth countries.

Employee Resource Groups

Raytheon’s employee resource groups have been an integral part of our diversity and inclusion journey — and a key to maintaining a richly diverse talent base. ERGs provide cross-business networks that lead and contribute to projects at Raytheon and in the communities where we do business.

We gave ERGs a new charter and structure that tightly align them with our strategies and priorities. Their cross-business networks and commitment to making Raytheon a more inclusive workplace for everyone is invaluable.

From tapping into professional networks that serve women and people of color to supporting the development of all Raytheon employees, ERGs are indispensable to the long-term vitality of our workforce and business.
Inclusive Leadership Training

In 2017, we introduced a new educational module named the Inclusive Leader and delivered it to every Raytheon leader. The course helps leaders better understand the scope and challenge of managing and leading in a diverse/multicultural workplace. It heightens their awareness of key concepts related to group identity. And it equips leaders with the skills they need to engage their teams and employees one on one. We are also embedding the Inclusive Leader content into a number of leadership events. Survey results and feedback have been overwhelmingly positive.

Women’s Forum

We also launched our inaugural Raytheon Women’s Forum, where 360 leaders gathered in Dallas, Texas, to identify and remove barriers to career advancement for women. Participants engaged in honest, productive dialogue about the challenges women face in the workplace and identified specific actions to address those challenges at Raytheon. Small groups of women were empowered and funded to conduct “experiments” on topics such as flexible work arrangements, leadership and succession planning. Several of these experiments led to initiatives that will be adopted across the company.

RAYTHEON WOMEN IN ENGINEERING, SCIENCE AND TECHNOLOGY

Many of Raytheon’s female engineers also volunteer their time for Raytheon’s STEM outreach to girls at area schools. They also participate in our Raytheon Women in Engineering, Science and Technology program, known as RWEST. They mentor early-career women on the many paths available in engineering and encourage them to make bold moves and follow in their footsteps.

MORE THAN 90 PERCENT OF RAYTHEON LEADERS COMPLETED THE INCLUSIVE LEADER EDUCATION MODULE IN 2017.

“The Women’s Forum gave me an opportunity to connect with colleagues from across the company who shared similar experiences and challenges. The networking opportunities have created long-term relationships that are impacting my career and success today.”

— Erin Scheaffer, Raytheon Women’s Forum attendee
Sexual Harassment

Sexual harassment is a pervasive type of discrimination that affects individuals across all industries. Advancements have been made in anti-harassment policy and education over the decades, but the recent news illustrates that we are still far from a world in which individuals feel safe and empowered.

At Raytheon, we strive to ensure a high-integrity and retaliation-free environment and to strengthen employee advocacy.

Every employee is required to review and acknowledge Raytheon’s code of conduct, which states that “employees are expected to treat fellow employees, customers and business partners with respect and dignity.” Respecting others is not only the right thing to do, but it also helps our business by creating an environment that fosters productivity, collaboration and innovation.

Regarding sexual harassment, we strictly enforce Raytheon’s Sexual Harassment Policy. We also provide companywide and targeted communications and training in accordance with applicable laws to ensure that employees understand:

- What sexual harassment is.
- How to report sexual harassment.
- The employee’s role in preventing sexual harassment.

Managers of people have a special obligation to encourage an open work environment and culture where employees are treated respectfully and can raise issues or concerns without fear of retaliation. This includes responding promptly and appropriately to any allegations of reported harassment.

Together we ensure not only a legally compliant workplace, but also an environment where all employees can thrive, succeed and contribute to their fullest potential.
GLBTA Support

Raytheon also expresses our commitment to diversity and inclusion through our support of gay, lesbian, bisexual, transgender and allies employees. We achieved a 100 percent rating on the Human Rights Campaign’s 2017 Corporate Equality Index, which is the national benchmarking tool on corporate policies and practices pertinent to gay, lesbian, bisexual and transgender employees.

We were the first company in our sector to achieve a perfect rating on this index. In 2017, our GLBTA employee resource group promoted awareness and support by circulating an ally wall for Raytheon leaders and employees to sign.

This was an important opportunity to express our shared values by supporting a vulnerable GLBTA community that faces unfavorable policy changes in some states where we operate.

We strive to broaden the dialogue around diversity issues, welcome all voices and answer all questions.

WORKPLACE OF THE FUTURE

As our work, workforce and work habits evolve, we’re enhancing our value proposition by addressing key elements of the workplace experience. We’re creating flexible workspace options — both physical and virtual — that encourage “place making” at the office and empower employees to choose how they work — in shared space, in a private cube, at home or at a customer site. This flexibility makes employees more engaged and more productive and enhances their emotional and physical well-being.

JOB TRAINING INSPIRES AFGHAN WOMEN

Education can be empowering for women, increasing their social mobility and participation in the labor force. The U.S. Army recognizes its importance in Afghanistan, a country where UNESCO reports a current female literacy rate of 17 percent, and is funding a program to train Afghan women to support the Afghan National Defense Security Forces. The Gender Occupational Opportunity Development program, or GOOD, began in Kabul, Afghanistan, on Feb. 1, 2017.

Raytheon supports this program by employing two dozen instructors to teach 50 students across multiple locations. We provide English language instruction and literacy training in Dari and Pashto and also provide computer training targeted toward administrative work.

The program aims to empower students to communicate with the Afghan Army and coalition forces more effectively, qualify to fill positions in the government’s open job listings and begin to make informed decisions for themselves and their families.
SUPPLIER DIVERSITY

At Raytheon, supplier diversity is something we own and embrace. Each day, we challenge ourselves to become more inclusive — and to do our everyday jobs in ways that reflect our company’s values. We follow a deliberate diversity strategy that combines an acute focus on the specific solutions suppliers provide with a stratified approach to use companies of various sizes.

This strategy drives innovation, agility and competitiveness within our supply chain and allows us to deliver the innovative solutions our global customers depend on.

We continue to mentor and develop small businesses to ensure mutual success. Our strong relationships with the National Minority Supplier Development Council, the Women’s Business Enterprise National Council and other advocacy organizations provide a valuable source of new suppliers — and an opportunity to share knowledge, advice and information with prospective partners.

In 2017, we participated in 75 customer, local and national outreach events to identify and provide access to potential small business partners. Raytheon received several awards for our advocacy, development and utilization of small and diverse suppliers. For example, we received the prestigious Department of Defense Nunn-Perry award, which honors companies demonstrating performance excellence in conjunction with the Department of Defense’s Mentor/Protégé Program. Raytheon was also recognized as one of America’s Top Corporations for Women’s Business Enterprises, earning a “GOLD” award from the Women’s Business Enterprise National Council. This national award honors companies with leading Supplier Diversity programs who are sustaining results and creating innovative and best practices that support Women Business Enterprises. The National Veteran Small Business Coalition also recognized us with a Champions of Veterans Enterprise award.
Raytheon doesn’t just do business with suppliers — we invest in them by helping them become better supply partners to other companies, and more engaged members of their communities.

In 2016, Raytheon’s existing vacuum brazing provider closed its operations. In vacuum brazing, workers join pieces of metal using a sealed, air-free furnace. Raytheon uses these parts for radar systems that affect multiple contracts across the enterprise.

At the time, more than 120 purchase orders were open for the aluminum vacuum brazing parts.

Raytheon turned to an existing supplier to meet this critical enterprise need. We approached Riverside Machining and Engineering, a woman-owned small business known for innovation and performing difficult specialty work.

Together, Raytheon and Riverside implemented lean manufacturing capabilities to ensure on-time delivery of parts and increased capacity in Riverside’s machining centers in support of Raytheon as well as their other customers.

Riverside met the challenge, integrating many projects and meeting aggressive delivery schedules for multiple programs and customer platforms. For doing so, Riverside won Raytheon’s EPIC Supplier Excellence Program Award, which recognizes a supplier’s overall excellence in performance, innovation and collaboration.

IN 2017, RAYTHEON PROCURED 26.3 PERCENT OF PRODUCTS AND SERVICES FROM SMALL BUSINESSES.

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<thead>
<tr>
<th>Percentage</th>
<th>Description</th>
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<tr>
<td>26.3%</td>
<td>Total small business procurements</td>
</tr>
<tr>
<td>4.9%</td>
<td>Minority-owned business</td>
</tr>
<tr>
<td>4.5%</td>
<td>Women-owned business</td>
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<tr>
<td>4.2%</td>
<td>Veteran-owned business</td>
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</tbody>
</table>

Raytheon procured 26.3% of products and services from small businesses in 2017, with 4.9% from minority-owned businesses, 4.5% from women-owned businesses, and 4.2% from veteran-owned businesses.
BENEFITS: TOTAL REWARDS

Raytheon has created a comprehensive Total Rewards program designed to meet the diverse needs of our multigenerational global workforce. This program creates value for Raytheon by enabling us to attract, motivate and retain the market’s best talent, and by helping our people to bring their best selves to work each day and give their best efforts to support customers.

Total Rewards creates value for employees and families by giving them the pay and benefits programs and flexibility they value most. Our Total Rewards program helps our people to be their best both at work and at home.

HEALTH AND WELL-BEING

Our health benefits include comprehensive programs, services and resources that address the health needs of our employees and their families and promote a culture of well-being.

We also sponsor a variety of employee programs. These include a rewards-based, digital wellness program and a work/life resource and referral program that offers counseling and learning programs, plus emergency backup care for children and adults.

Our goal is to help ensure that our employees stay physically and emotionally healthy. They can access immediate, on-the-job and at-home help to support their short- and long-term medical and well-being needs, including wellness, work/life balance and employee assistance programs.

We encourage all employees and their families to cultivate physical health; mental and emotional agility; personal finance acumen and stability at home, in their communities and in their personal lives. This balance makes our people more productive, resilient and better able to meet workplace demands.

Each year we review our programs and services for ways to enhance the Total Rewards program, so it addresses our employees’ needs and increases the number of members who engage in our wellness program. In 2017, 44.5 percent of eligible employees — 25,167 — enrolled in our LiveWell wellness reward program, a 7.5 percent increase since 2016.

In 2016, we became one of the first in our industry to offer paid parental leave. Available to all eligible male and female employees having or adopting a child, our parental leave benefit provides three paid weeks of leave, separate from paid maternity leave or benefits under the Family and Medical Leave Act.
Raytheon is planning to meet the changing needs of our workforce. As our international workforce increases, we're examining regulatory requirements and market practices in several growth countries to find new healthy solutions for expatriates, local nationals and third-country nationals. We continue to expand our knowledge of global healthcare offerings, to assist our deployed employees and families with access to quality medical services and providers and to manage complex medical cases in-country.

We continually research new technology, benefits and services and best practices, to ensure our Total Rewards program continues to meet the diverse and evolving needs of our workforce. And for our wellness rewards program, we've implemented strategies to keep our new and returning participants highly engaged.

RAYTHEON WINS HEALTHY LIFESTYLES® AWARD

In 2017, the National Business Group on Health, a nonprofit association of 425 large U.S. employers, honored Raytheon with a Gold Level Best Employers for Healthy Lifestyles award for having one of the nation’s best workforce health and well-being programs.

We were one of 18 Gold Level recipients, and among the 48 U.S. employers that received an award this year. The National Business Group on Health focuses on health and well-being as a competitive advantage supporting an effective, engaged and resilient workforce.

Dr. Sandra Stratford, Raytheon’s chief medical officer, was recently honored for her dedication and commitment to Massachusetts’ vibrant healthcare and life sciences industry. The award recognized the 50 most influential people of color in the Boston area.

KUWAITI TEAM COMMITS TO HEALTHY LIVING

Healthy living can be a real challenge for members of Raytheon’s Warrior Training Alliance effort in Kuwait. Summer temperatures can reach 122 degrees, making exercise and sleeping difficult. Limited healthy eating options on the Army base make it tough to maintain good eating habits.

In early 2017, this team of 12 employees, led by Raytheon country manager, “Bear” Johnson, made a conscious decision to live healthier lives and turned to Raytheon’s wellness program for guidance and support.

They refurbished their kitchen so they could prepare healthier meals using fresh fruit and vegetables from local markets.

They began using activity trackers to monitor their exercise and track their overall progress. They also participate in all the enterprise challenges that are organized and promoted through the system. Eating together and going to the gym as a group has made the team more resilient, productive and stronger.

• In 2017, Raytheon was pleased to announce some important enhancements to our Total Rewards program for employees: Beginning January 2018, all Raytheon-sponsored medical plans now cover Applied Behavior Analysis therapy related to Autism Spectrum Disorder. Additionally, ABA therapy claims for eligible services received from qualified providers on or after Jan. 1, 2016 are being retroactively processed by UnitedHealthcare up until June 30, 2018.

• There is no pre-existing condition limitation on disability benefits for newly hired employees who are pregnant or become pregnant during their new hire enrollment period. Together with our first-in-industry Paid Parental Leave policy, these programs help the company continue to attract and retain the employees we need to grow and better compete in the global marketplace.

RAYTHEON | 2017 CORPORATE RESPONSIBILITY CUSTOM REPORT

EMPOWERING OUR PEOPLE
HEALTH AND WELLNESS PROGRAMS AND RESOURCES

Raytheon’s health and wellness program includes the following programs and resources:

On-Site Health Centers

Our 25 on-site health centers are staffed by 72 full-time contract employees, including 16 full-time employees who support workers virtually at sites without health centers, when they travel for business and when they’re on global assignment.

Clinical staff consults on work-related injuries and fitness for duty, non-work-related episodic care, medical surveillance and regulatory exams, disability cases and return to work, drug and alcohol testing, and preventive health and wellness programs. In 2017, these centers served over 25,000 people.

Online Wellness Portal

Over 25,000 employees access fitness and nutrition apps, record daily exercise and nutrition, link to mobile devices and wearables and check wellness rewards each week. Raytheon-enrolled employees tracked close to 19.1 billion steps in 2017.

On-Site Exercise Facilities

There are 24 unstaffed exercise facilities available at no charge, day or night.

Rewards-Based Digital Wellness Program

The Virgin Pulse Livewell program offers all eligible employees and their spouses the opportunity to each earn up to $250 annually by creating custom programs and accumulating points. Employees develop personalized plans that meet specific goals and objectives. In 2017, over 30,000 employees and spouses were enrolled in the program.

Healthy Worksite Award

Raytheon encourages all sites with health centers to apply for the Healthy Worksite Award and for our internal program that measures well-being engagement and practices. The number of Raytheon employees working at a site that has achieved a Healthy Worksite Award recognition reached 45,694, or 80 percent in 2017.
WORK/LIFE RESOURCES AND REFERRAL PROGRAMS

We provide counseling, learning and education assistance programs, emergency backup care for children and adults, convenience services referrals and grief counseling. Raytheon partners with Life Resources Employee Assistance Program to create a Work/Life program that offers 24/7 assistance to help meet the diverse individual needs of employees based on lifestyle and personal circumstances. In addition to web-based and telephonic support, there are 12 on-site providers covering 21 sites in the United States that provide confidential, comprehensive consultations that help employees and their families manage life’s demands and provide managers with strategies to address workplace behaviors.

We provide backup care for children, or adult and elder care (up to 20 days per year) for employees and their families, through Bright Horizons trained care consultants. Available 24/7, they do all the work to find the appropriate backup care needed at home or in a day care facility. In 2017, 3,075 employees registered for Bright Horizons and reported 2,987 days saved from having to miss work.

Raytheon is also partnering with College Coach to assist employees with all aspects of their children’s college selection, application and finance processes. This program — provided at no cost to Raytheon employees — is composed of onsite events with video conference to other locations, in-depth online resources, and personalized assistance. Each hour our employees spend with a college coach saves them five hours of time, and employees saved a combined 339 hours since the program launched in June 2017. By the end of the year there were 515 registered employees representing 24 states. According to a Raytheon employee who recently used the program, “the program shows that my employer cares about my personal and professional well-being — and about the matters I’m dealing with right now.”

Employee Assistance Program

There are 12 on-site providers covering 21 sites in the United States that provide confidential, comprehensive consultations that help employees and their families manage life’s demands and provide managers with strategies to address workplace behaviors.

Flex Time and Flexible Working Arrangements

At Raytheon, many employees work what’s known as a 9/80 schedule, meaning they put in their time and take every other Friday off. Others work a more standard schedule but can arrange to shift their time around when they need to.
EMPLOYEE VOLUNTEERISM

A CULTURE OF GIVING

We believe that the time and talent of our people is as important and impactful as any donations they give. That’s why we encourage employees to volunteer their time and skills to support local communities and organizations. Our volunteer program aligns employees with community organizations that benefit from their job skills.

Employees experience the satisfaction of making a meaningful difference, and their passion and commitment helps further community initiatives. We recognize employees for their service with:

- Presidential Volunteer Service Award, where employees log their volunteer hours and earn recognition from Points of Light for their community efforts.
- “iVolunteer” program, in which senior leaders award Service Coins to employee volunteers who then pass them on to others whose great community work inspires them.

DISASTER RELIEF

In 2017, natural disasters contributed to an unprecedented year of humanitarian crises. As Hurricane Maria approached Puerto Rico, the Visible Infrared Imaging Radiometer Suite instrument Raytheon engineered for NASA-NOAA’s Suomi NPP satellite captured a thermal image of the hurricane’s eye.

Six Raytheon-built Coyote® UAVs also dropped out of a NOAA WP-3D Orion weather surveillance plane to record additional data from inside the eye. We knew this storm posed a deadly threat to employees who work there and to the country at large.
Raytheon and our people stepped forward to provide broad relief support. Together, we pledged more than $600,000 to help victims of hurricanes Harvey, Irma and Maria. That includes direct company donations to relief organizations and matching grants for employee donations.

Raytheon committed $100,000 to the hurricane relief effort One America Appeal, a nonprofit launched by all five living former U.S. presidents. The One America Appeal will designate Raytheon’s donation to the nonprofit United for Puerto Rico, established by the office of First Lady of Puerto Rico Beatriz Rossello, to help the affected citizens of the U.S. territory.

In addition, employees are supporting affected colleagues through the Raytheon Employee Disaster Relief Fund. In 2017, this fund provided individual grants of up to $10,000 to 40 Raytheon employees who are victims of natural disasters and other emergencies in federally declared disaster areas.

LENDING A HAND TO OUR TEAMMATES

Raytheon has more than 30 employees in Puerto Rico, and most chose to stay and ride out the storm to work in support of our customer, the U.S. Navy, on a radar program that tracks aircraft and surface ships across the Caribbean, a service with a critical need during hurricane season. When Hurricane Maria struck the island, Raytheon used company jets to fly food, water, generators and other critical supplies to San Juan and returned with a number of people, including Raytheon family members, young children, wounded combat veterans and senior citizens. All had been stranded and were struggling to survive since the island’s power grid had been knocked out. “The relief needed to arrive as quickly as possible,” said Rebecca Rhoads, president of Raytheon Global Business Services, who helped deliver the supplies and assisted families as they arrived to board the planes. “It was just an intense level of collaboration and commitment to support each other and our communities in a time of dire need.”

EMployee VOLUNTEERISM BY THE NUMBERS

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<thead>
<tr>
<th>136,000 HOURS</th>
<th>38 STATES</th>
<th>332 EMPLOYEES</th>
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<tr>
<td>Recorded 136,000 volunteer hours in 2017</td>
<td>Volunteered at 1,900 organizations across 38 states</td>
<td>Qualified 332 employees for the Presidential Volunteer Service Award</td>
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WORKPLACE SAFETY

We owe our people a safe environment where they can work comfortably and avoid risks that can lead to injuries. The investments we’ve made to our safety programs have made us more competitive, more productive and even more focused on health and safety.

PROTECTING PEOPLE

Raytheon has a strong commitment to protect our people. Our ultimate goal is nothing short of an injury-free workplace and we continually implement programs and innovations that promote the safety and wellness of our employees.

Over the last decade, our efforts to enhance our safety programs have made today’s safety record the best in Raytheon’s history, with injury rates among the lowest in our industry.

In 2017, Raytheon achieved a recordable injury rate of 0.52 injuries per hundred employees, which is the lowest in our history. This rate has decreased by 29 percent since 2010. Our Days Away, Restricted, and Transferred injury rate in 2017 was 0.23, tied for the lowest year in our history. It has declined by 34 percent since 2010.

RECOGNIZED FOR SAFETY EXCELLENCE

We continue to engage in the Occupational Safety and Health Administration’s Voluntary Protection Program. Raytheon leads the aerospace and defense industry in the number of OSHA-certified VPP “Star” sites.

VPP “Star” certification recognizes exemplary success in preventing and controlling occupational safety and health hazards, and in continuously improving the site’s health and safety management system. Raytheon has 36 sites that have OSHA VPP “Star” certification. Raytheon is among rare company: only 2,205 facilities of any kind in the country have earned the status.

Approximately 78 percent of domestic employees work at Raytheon locations that have received this prestigious safety status. In 2017, seven of our facilities successfully recertified their VPP “Star” certification: IDS San Diego, California; IIS Indianapolis, Indiana; RMS Diné Farmington, New Mexico; RMS Lemmon Ave, Dallas, Texas; RMS Louisville, Kentucky; SAS El Segundo, California; and SAS Aberdeen Proving Grounds, Aberdeen, Maryland.

SAFETY INITIATIVES

A majority of Raytheon’s workplace injuries result from ergonomic hazards, which include injuries from lifting, lowering, pushing or pulling objects, or from repetitive motion in both the manufacturing and office environments.

Our enterprise ergonomics team has identified sites with potential elevated ergonomics risks and is now focused on assessing baseline ergonomic risks and developing innovative solutions to reduce risks.

The ergonomics team is also developing enhanced ergonomic training for employees, including ergonomics evaluator training courses and an ergonomics vignette to help communicate ways to reduce ergonomic risk.
We’ve also partnered with our insurance company to develop an enhanced slips, trips and fall assessment that will be conducted at our major sites. This enhanced assessment uses a focused employee perception survey to prioritize areas of a site that are likely to cause a slip, trip or fall so the team can further investigate and assess them. Going forward, a comprehensive self-assessment process will ensure that the site conducts proactive reviews on a continuous basis to prevent conditions that could lead to a slip, trip or fall incident.

Finally, we issued a slip, trip and fall vignette to help increase employee awareness about this topic by calling attention to specific conditions and actions such as walking and using a cellphone.

Our risk heat map process is helping us identify additional hazards and risks at many of our sites by ranking risks based on specific criteria. We continue to expand this process to more sites. We then design and implement risk mitigation measures centered especially on high hazards/risks that may potentially cause serious injury or fatality.

10 YEARS OF OSHA VPP

The signs of a culture of safety are everywhere at Raytheon — and that’s no accident. It’s been a long journey. A turning point came 10 years ago when the first Raytheon location — Aurora, Colorado — obtained the OSHA VPP “Star” Certification.

“VPP offers the framework for safety management system performance excellence across the enterprise in a unified and effective approach,” notes Jose Rodriguez, the EHSS lead for Raytheon IIS and member of the National VPP Participants’ Association’s board of directors. “VPP is a catalyst for empowering employees and management to strengthen their safety processes.”

Since that time, the VPP program has spread to 36 of our sites. Some of these VPP sites are among the largest and most complex sites in their region, like El Segundo, California; Andover, Massachusetts; and Tucson, Arizona. Other firsts include Raytheon’s Mission Control and Verification Center at White Sands, New Mexico, the first VPP site at the missile range, and Raytheon’s Diné facility, the first VPP site on the Navajo Indian reservation.

Raytheon Precision Manufacturing’s Lemmon Avenue facility in Dallas, Texas, is a prime example of the difference VPP can make. The site was struggling with employee injuries in 2007, so leadership took the initiative to fix the problem by making a multiyear commitment to becoming a VPP “Star” site. In 2010, the site earned VPP “Star” status, and injuries had dropped significantly.

Fast forward to 2017, and the site’s VPP recertification audit resulted in zero findings. “We are very proud of the fact that OSHA left our site with no outstanding actions, which is very rare,” said Kelly Hyatt, the EHSS manager for Lemmon Avenue. Hyatt herself was recently singled out for special recognition by her OSHA area director.
SAFETY GOES INTERNATIONAL

As Raytheon grows globally, so do the needs of Environmental, Health, Safety and Sustainability support at all our locations — including radar sites, field-deployed locations or brick and mortar facilities. International locations can have unique health and safety risks and issues. Local regulations often differ from U.S. OSHA regulations. And there can be strong cultural aspects that influence employees’ views and behaviors relating to safety.

“We want all Raytheon employees to work in a safe environment regardless of where they are located,” says Mike Donohue, who was recently promoted to a newly created position of International EHSS Manager in the Corporate EHSS Office.

Donohue is forming an enterprise International EHSS team to develop systems, tools and templates that can be easily deployed at international locations, especially at sites that don’t have an EHSS professional. This will help our international program managers and ultimately our customers.

Donohue has the right background to lead this effort. He worked at the Kwajalein Missile Range in the Marshall Islands for eight years and spent five years working for Raytheon’s IDS’ EHSS group supporting international sites. “We strive to continually enhance our programs and systems internationally to ensure the safety of our employees worldwide.”

EHSS is also participating on a Raytheon Six Sigma™ team formed in 2017 to improve timely and effective support for international operations. The team is led by Global Business Services Facilities Management and is composed of stakeholders who are involved in supporting international operations, such as Facilities, EHSS, Real Estate, Supply Chain, Operations, IT, HR and Engineering.