LARGE SCALE SOCIAL IMPACT REQUIRES GLOBAL REACH AND LOCAL RELEVANCE

To truly make progress on the world's largest societal issues, such as community health, economic development, and education and skills development, governments, companies, and nonprofits must work together. Social, environmental, and economic barriers are interconnected, and public-private partnerships (PPPs) are key to bringing together the knowledge, expertise, resources, and networks needed to tackle global challenges. Successful PPPs focus on locally relevant practices, while developing and implementing policies, programs, and platforms that enable social impact solutions to be scaled across regions, or, where appropriate, worldwide.

Successful PPPs establish collaboration between the public sector, non-governmental organizations (NGOs), and the private sector, while ensuring that solutions are sustainable for individual communities. These PPPs leverage public sector strengths, including reach and access to key audiences, funding, support for infrastructure, and the ability to develop new policies or provide a license to operate. They use NGO expertise in meeting the needs of underserved communities and draw on private sector core competencies: knowledge and expertise, the ability to innovate and change quickly, and access to digital technologies and business processes.

When these strengths are combined, PPPs deliver meaningful and sustained outcomes to communities across the globe, addressing major global issues, while accounting for differences in culture, society, and governing models. Successful long-term PPPs also focus on shared value, creating a win-win for all groups involved to ensure long-lasting impact. For some companies, business value stems from increased employee engagement, attracting and retaining talent, an opportunity to innovate or incubate new products or business models, or even environmental sustainability. At Cisco, our win-win PPPs not only contribute positive benefits to society and the environment, but also enable us to build trusted relationships with governments, NGOs, and corporations. This can benefit everyone by building healthy talent pools, communities, and markets.

Leveraging win-win public-private partnerships to achieve large-scale impact

In a recent interview with the Harvard Political Review, Todd Herberghs, Executive Director of the National Council for Public-Private Partnerships, said that at least 50,000 public entities at the local through federal levels could potentially benefit from a PPP, and according to a 2009 McKinsey Global Health Study:

"Challenges such as poverty, public health, and education – long considered purviews of government – have proved stubbornly resistant to government-only solutions. However, collaborative efforts between the public, private, and civil sectors to address major societal challenges have delivered progress. Working together, the three sectors are often able to accomplish far more than any can do alone."

Gavi, the Vaccine Alliance, is an example of a successful win-win PPP whose mission is to provide equal access to vaccines. Partners including the Gates Foundation, UNICEF, World Health Organization, World Bank, governments of developing and developed countries, and pharmaceutical companies have vaccinated 580 million children since 2010. By supporting 10 vaccines, including those to prevent yellow fever, measles, and rubella, Gavi has contributed to averting more than eight million deaths in developing countries since 2000.

At Cisco, we've seen how leveraging innovative PPPs can achieve large-scale impact. Cisco Networking Academy, a world-leading IT skills and career building program, addresses the growing need for IT talent by equipping students with entry-level IT and 21st-century career skills. The program is based on partnerships with over 9,600 schools, community colleges, universities, governments, NGOs, and other organizations, which implement the program across 170 countries. Our global impact includes providing IT education to more than one million students each

year – totaling 7.8 million students since 1997 – and improving the lives and economic stability of communities worldwide.

One Networking Academy student, Rebecca Baca, was a 27-year-old single mother living with her parents in Albuquerque, New Mexico, when she enrolled. After several years working in low-paying hospitality jobs, she wanted to make a better life for herself and her daughter. Though she had very little computer knowledge, through hard work, dedication, and supportive mentors, she completed her Cisco Certified Network Associate (CCNA) courses, landed an internship at Network Architects and after three months was offered a full-time job. Using the technical skills she learned as a Networking Academy student, Rebecca was able to move into project management and was the first woman in the organization to become a project consulting engineer. Millions of students like Rebecca have changed their lives through the Cisco Networking Academy, and we encourage you to read their stories.

Project Consulting Engineer Rebecca Baca at work at Presidio (formerly Network Architects)

In support of Networking Academy partnerships, Cisco provides the e-learning curricula, assessments, simulation software, experiences like hands-on labs and global competitions, learning management platform, and instructor professional development, as well as the knowledge of the skills needed for jobs of the future. Our educational partners provide instructors (such as their teachers or professors), classrooms, and lab equipment, and help attract students to the program. Networking Academy's global reach depends on effective and strategic PPPs with government and academia that provide access to and support of the 20,000 instructors delivering our curricula worldwide.

As an example, our collaboration with the French government highlights how public-private partnerships can produce real results for society and business. Cisco Networking Academy applies Cisco's world-leading technology knowledge and solutions to address human capital development, a key component of Cisco's digital acceleration strategy. As part of this strategy, Cisco embarked on an ambitious partnership with the French government in 2015 to accelerate the country's transformation into a digital republic, fueling economic growth, creating jobs, improving the quality of access to education and public services, and increasing France's overall global competitiveness. In support of this partnership, Cisco committed $200 million in investments to training 200,000 Networking Academy students, investing in innovative start-ups, developing national network infrastructure, researching smart cities, and broadening cybersecurity expertise.

So how does a company or organization develop and sustain successful public-private partnerships to achieve large-scale impact?

First determine *who* to work with: Successful PPPs start with stakeholders who are engaged, committed, and able to execute a shared vision. Commitment and support from the highest levels of government and the institutions involved are essential, and all partners should have "skin in the game" to authentically demonstrate their commitment. It's important to use quantitative and qualitative research to assess partnership opportunities and risks, and to understand potential challenges that partners may face in fulfilling their pieces of the partnership. This might include market research and financial analysis to determine funding priorities, or a political landscape analysis to determine an approach that is appropriate and feasible given the political climate.

For example, successful PPPs with the highest level of governments and leading academic institutions across the world have helped Cisco scale inclusive social and economic impact. In Costa Rica, nearly 60,000 students have benefited from Networking Academy courses. Our ten-year partnership with the Costa Rica Ministry of Education has provided the country with an opportunity to thrive in the digital revolution. The information economy demands an unprecedented level of technological literacy for workers, yet in many countries there is a severe shortage of trained networking and IT specialists. To enhance technical training, enable Costa Rica to compete in the digital economy, and improve people's career options, the Networking Academy core curriculum is now taught in 102 of its 138 technical schools for students in the IT specialization.

Daniela Molina Quesada, pictured below, is a Networking Academy alumna and a civil servant at the Caja Costarricense Seguro Social (CCSS), Costa Rica's social security fund. After studying computer science at a rural

technical school, Daniela enrolled in the Networking Academy program. She earned her technical degree in computer science, successfully completed all four Cisco CCNA modules, and earned a scholarship to study Systems Engineering at the Fundacion Omar Dengo.

Thanks to the Networking Academy program, Daniela was able to get a great job working in the Department of Technology Management at CCSS. "Cisco was the first door that led to a whole new world professionally. Thanks to Cisco, I was given a job opportunity that has been one of my greatest achievements. Every day, I apply the knowledge I gained from Networking Academy, and this experience undoubtedly led to my ability to get a job that I love," said Daniela. Daniela has been at her job for nearly six years and currently supports more than 35,000 network users at CCSS. She believes technology and networking can transform lives and urges "everyone to get involved in the world of networks and to be part of the Cisco Networking Academy community."

Recognizing the need for digital skills in all career paths (tourism, management, etc.), the Ministry of Education plans to make Networking Academy courses available for all students in technical schools in 2017, regardless of their area of specialization. While Networking Academy is helping Costa Rica develop a workforce trained in essential skills, this partnership also led to a [2017 Letter of Understanding](#) between Cisco and the government of Costa Rica. Working at a country level, this Letter of Understanding highlights Cisco's role in helping Costa Rica realize its digital agenda by driving digital education, providing access to telecommunications services, and enhancing cybersecurity.

Second, determine *when, and how long,* to engage: Successful public-private partnership programs are strategic multi-year, multi-phased engagements, not single transactions. It's important to provide flexibility in the level and length of engagement. But, to have large-scale impact, a core set of partners should be committed for the long-term.

While Cisco Networking Academy was well established in Africa in the early 2000's, we determined further investments were necessary to help improve standards of living through the transformative power of information and communications technology (ICT). In 2007, Cisco made a US$10 million, four-year Clinton Global Initiative (CGI) commitment to support ICT-driven development strategies in five countries in sub-Saharan Africa: Ethiopia, Kenya, Rwanda, South Africa, and Uganda. This strategic commitment to connect underserved populations was closely aligned with CGI's focus on poverty alleviation, education, and global health, and was realized primarily through the establishment of locally managed and self-sustaining Community Knowledge Centers (CKCs). While each CKC is designed to be adaptive to specific community needs, all CKCs are technology hubs in rural communities that provide access to the Internet, education, and training classes.

Cisco, together with local governments and several NGOs, established a holistic and collaborative strategy that leveraged every partner's strengths to improve access to digital knowledge, skills, and opportunities for economic participation. For example, Cisco provided its expertise and knowledge, funding, technology, training, marketing assistance, community portals, and curriculum to help establish and support successful CKCs. One Global Economy, a nonprofit, developed the Beehive, an online portal of global best practices and localized information for CKC staff, and held community workshops to inform site content. Appleseeds Academy, another nonprofit partner, developed the support structure for the CKCs and provided on- and off-site support for CKC staff.

For Nyangwete, a tiny village on the shores of Lake Victoria in Kenya, a CKC started in 2009 has created an opportunity for villagers to overcome enormous challenges. The remote fishing village was isolated by location and lack of power before the CKC opened and extreme poverty forced more than 12,000 children into the care of the state because parents could not provide for them.

Judith Yucabeth Otieno, pictured above, was a former primary school teacher who now sells sorghum, maize, millet, and fish at the daily afternoon market outside the CKC. A basic ICT skills class opened a new world of information to her. Learning about business in other countries has inspired her to improve her fishing techniques and enabled her to fix her boat. Judith also stays connected to family, visiting the CKC regularly to email and video with her children and grandchildren who have moved away from the village. Entrepreneurs, many of whom took IT classes at the CKC, have opened small businesses around the thriving CKC, and the standard of living in the village has increased dramatically. As villagers prosper, more parents are able to care for their own children. The number of children who depend on the state has dropped from 12,000 to 6,000, creating a brighter future for all of Nyangwete.

The CKC model is now a scalable model for sustainable, community-led development and has advanced the concept of connected communities as a long-term, ICT-based poverty alleviation strategy. After six years of significant impact, Cisco successfully transferred the ownership of this program to local government and NGO partners in 2013. At that point, through public-private partnerships we had supported 114 centers, 24 of which were started from the ground-up by Cisco. To date, our local government and NGO partners continue to use the CKC model and have expanded CKCs into additional NGOs in South Africa and Ghana.

Third, determine *how* to execute: The partnership must develop a clear vision, differentiated strategy, and detailed execution plan to drive long-term success. This includes defining outcomes for the PPP that are informed through stakeholder input, establishing an effective governance structure with clearly defined and transparent operating practices, and agreeing upon roles and accountabilities in advance. In our partnerships we've found it helpful to identify and fund a program management lead who is solely responsible for successful program execution. Successful PPPs have both a defined business model (eg. "build, operate, own" like Cisco's Networking

Academy model, or "invest, transfer" like our CKC model) and a defined solutions model that considers key risks, scalability, replicability, and long-term sustainability. Developing an exit or transition strategy is also a critical component of early discussions to ensure clear expectations from all parties. It's important to develop multiple exit or transition strategies ahead of time knowing that even the best planned partnerships can be disrupted by technology transitions, government changes, or serious funding challenges.

The Jordan Healthcare Initiative (JHI) was a strategic collaboration between Cisco and the government of Jordan with a clear vision to improve the efficiency of and access to quality healthcare services for people in Jordan, particularly those living in rural and/or underserved areas. Four JHI projects were clearly defined and implemented in collaboration with multiple partners, including the Jordan Ministry of Health, Jordan Ministry of ICT, and the Royal Medical Services, who each had a defined role. By collaborating closely with the Jordanian government through JHI, Cisco provided our expertise in networking, security, and collaboration technologies to enable telehealth solutions, and established our credentials as a good corporate citizen and reliable business partner.

The journey to the Jordanian capital of Amman is a daunting one for rural patients who require specialty medical care. They must leave the familiar behind to travel hundreds of kilometers to a hospital where they wait in long lines for a consultation. In 2012, Haifa Abd-El Karim Omoush, a 34-year-old married woman with five children, was suffering from a treatable cardiac condition. Her local physician referred her to a specialist in Amman, but she missed or postponed her appointments because she had no one to care for her children and could not afford to travel to the hospital. When Haifa learned about a new care-at-a-distance clinic in her own community, she was able to connect with a cardiac specialist in Amman, who immediately diagnosed her and adjusted her treatment plan. The care-at-a-distance clinic helped Haifa's condition improve and this gave her more time and energy to spend caring for her family.

Connecting urban specialists with rural patients and physicians via technology extends the reach of providers, increases access to healthcare, reduces costs, and empowers patients. Through JHI, our support and solutions enabled the delivery of affordable, quality healthcare services to remote and underserved communities, contributing to the Jordanian government's goal of improving quality of life for its people and its communities. JHI contributed to the transformation of healthcare delivery in Jordan; and from 2011 to 2015, over 176,000 patients benefited from the initiative.

Next, ensure *long-term sustainability*: Clearly defining success metrics, establishing a baseline, and developing a process for continuous monitoring helps PPPs determine what collaborative success looks like. Monitoring, analyzing, and reporting these metrics and outcomes can help prioritize projects as well as provide continuous learning, improvement, and replication opportunities. As mentioned above, it's also important to consider how the

political and partnership landscape may have evolved over time and to update the PPP model, transfer ownership, or implement an exit strategy accordingly.

Cisco Networking Academy is Cisco's longest-running corporate social responsibility (CSR) program, and this year we are celebrating 20 years of impact. We focus on keeping up with rapid technological change, student learning preferences, and employer needs to ensure Networking Academy remains, and will continue to remain, relevant and successful. As such, our program is insights-based and strategically designed to build interest and competency. Exploratory courses provide exposure to key digital skills, foundational courses develop conceptual understanding, and career-ready courses prepare students for entry-level or specialized careers. Our curricula are developed and continually refined through our in-house expertise and research, as well as our partnerships, preparing students for the continuously evolving needs of employers. We measure the entire impact spectrum from early indicators to outcomes, including: course registration and completion, student and instructor satisfaction, new jobs obtained, job opportunities obtained (e.g. higher salary or increased responsibilities) and educational opportunities obtained (e.g. pursuing a higher degree than intended), and use our global reporting to drive continuous improvements.

An important piece of our long-term strategy is making sure technology and innovation create inclusive opportunities, enabling all people and societies to thrive. As such, we recently committed to expanding the Cisco Networking Academy for people with diverse abilities. Over the past decade, more than 3,000 students with disabilities have benefited from Networking Academy courses, delivered in partnership with organizations helping students with vision, hearing, and selected physical disabilities. We are scaling the reach of this program and have a goal to empower 10,000 students with disabilities within five years.

People with disabilities often have poorer health outcomes, lower education achievements, less economic participation, and higher rates of poverty than people without disabilities, and we believe digital skills can be an equalizer. Wilson Nyabera, who is hearing impaired, grew up in Kibera, Africa's largest slum. Wilson, pictured above, earned his Cisco CCNA certification after taking Networking Academy courses at Deaf Aid in Kenya, and now works as a network engineer for Copy Cat, an office automation and information technology company. With his salary, he is able to invest in his community and his family, paying his mother's rent and his younger sister's school fees.

Finally, leverage *technology and innovation*: Leveraging technology and innovation is essential to further impact and realize efficiencies in PPPs. Successful PPPs must overcome technology gaps, build capacity, and streamline programs. Technology must be leveraged in two ways: first to build capacity through the use of technical tools and platforms, and second through the use of technical knowledge to ensure expertise and innovative practices are applied uniformly and consistently to community investment strategies.

A key example of technology innovation is Cisco's own development of a robust learning platform for Cisco Networking Academy. Accessed from netacad.com, the platform delivers learning experiences to students through video and collaboration technologies, the use of simulation tools that closely proximate hands-on experience with network equipment, and the use of big data and assessment technology to provide continuous student feedback.

Cisco's [16-year partnership with the United Nations Volunteers (UNV) programme](#) is a great example of leveraging technological knowledge. Networking Academy students and recent grads help fill technology gaps at UN agencies, leveraging their digital skills to support development projects. Since 2016, seven graduates trained in ICT have been building websites and mobile applications, designing programs using big data, and integrating online and offline activities at UN agencies. Through this partnership, UN agencies receive technical products that help streamline their programs as well as much-needed insights from the students on how to better use technology to increase efficiencies and scale solutions. At the same time, the students gain experience in a real work environment and are able to use their skills to contribute to societal and environmental progress.

Mohammad Ilham Akbar Junior, above, is a Networking Academy alumnus and one of the UN Youth Volunteers serving in the UNICEF Indonesia Country Office. Mohammad is serving UNICEF by supporting ICT incubators and labs, undertaking institutional audits of networking and technology needs, and training others to develop their ICT and networking skills. Mohammad highlighted the uniqueness of his experiences, commenting, "I learned that volunteering is the purest way to understand society because I can be part of it in a positive way and can approach challenges from different angles. Volunteerism is about making your vision of the future real. It is about the journey to become an innovator for an even better future."

Win-win public-private partnerships play a critical role in achieving global scale and local impact. We have an opportunity to close the digital skills gap, promote equitable education, support economic empowerment, and address critical human needs – all by leveraging the strengths of the public, private, and nonprofit sectors and collaborating to create value for everyone involved. Successful public-private partnerships, however, are not one size fits all. An approach that incorporates best practices, including utilizing the strategies above, helps ensure that all partners, as well as communities, benefit.

Over the past 20 years we have seen firsthand how critical PPPs are, as we've worked in collaboration to grow Networking Academy into the world's leading digital skills and career building program. Bringing new digital professionals into the workforce and building an inclusive digital economy is good for society and business, benefitting partners, customers, and developed and developing economies. But most importantly, it benefits millions of students around the globe who receive affordable and accessible education regardless of their socio-economic background, geographic location, or life-stage.

To learn more about Cisco Networking Academy please visit www.netacad.com.