

NICE Community Coordinating Council Meeting Minutes November 28, 2023 | 3:30-5:00 p.m. ET

- I. Introduction and Ground Rules NICE Program Manager Susana Barraza
 - a. The NICE Community Coordinating Council was established to provide a mechanism in which public and private sector participants can develop concepts, design strategies, and pursue actions that advance cybersecurity education, training, and workforce development.
 - b. Members are encouraged to participate in the meeting via the platform chat space and the Q&A space.
 - c. Reminder: The meeting is not intended for marketing or other commercial purposes.

II. Opening Remarks

- a. Academic Co-Chair Zarina Blankenbaker, Ph.D., President, Tarrant County College Northwest
 - i. Dr. Blankenbaker shared that the American Association of Community Colleges (AACC) is hosting the annual Workforce Development Institute in New Orleans, Louisiana, January 23-26, 2024. The theme of the event is bridges. https://www.aacc.nche.edu/programs/workforce-economic-development/wdi/
 - ii. The draft agenda is available here: https://www.aacc.nche.edu/wp-content/uploads/2023/08/WDI.2024.Schedule.external.8.25.2023.pdf
 - iii. Three main topics of interest:
 - 1. Cybersecurity and workforce development
 - 2. Cybersecurity and artificial intelligence
 - 3. Faculty shortage in high technology fields, specifically related to cybersecurity
- b. Industry Co-Chair Michael Alicea, Chief Human Resources Officer, Trellix
 - i. There has been a slow down on hiring within some of companies, but not necessarily in high technology companies or subject matter expert spaces. Companies are still in the 15% to 20% attrition rate as they move from group to group and the ancillary pieces that support cybersecurity go down to 9% or 10% attrition, which is a very different situation. To conclude, cybersecurity is not going through a slowdown in hiring.
- c. Government Co-Chair Rodney Petersen, Director of NICE
 - i. Rodney will be attending AACC's Workforce Development Institute in New Orleans, Louisiana.

- ii. The NICE Team attended the National Governors Association Cybersecurity Credentialing and Pathways forum two weeks ago. One theme to walk away with was the topic of skills-based hiring. One of the NICE Team's goals for next year is to focus on how we appropriately message the importance of skills-based hiring without diminishing the importance and value of corresponding credentials like high school diplomas, academic degrees and certificates, and certifications. https://web.cvent.com/event/8b65d451-4f15-4f03-8643-b33ebcc4e83e/summary
- iii. It was reported that 17 states have passed laws or policies that removed degree requirements from position descriptions, and the federal government, through executive order, has a similar directive.

III. Standing Items

a. Report Roundup – Learning from Good Ideas

Update from the IoT Federal Working Group and IoT Advisory Board
Presented by Barbara Cuthill and Katrina Megas, National Institute of Standards and
Technology

URL: https://www.nist.gov/itl/applied-cybersecurity/nist-cybersecurity-iot-program/iot-federal-working-group

- The 2021 National Defense Authorization Act directed the Secretary of Commerce to deliver a report to Congress on IoT adoption. Two ways of doing so are through the interagency working group and via an advisory board of nongovernmental stakeholders.
- ii. The purpose of the report is to provide recommendations on what the federal government needs to do to overcome barriers to IoT adoption and to get that adoption broadly in the economy. This is aimed at the civilian economy.
- iii. Market sectors including healthcare, agriculture, transportation, and others were forced to be included into the IoT advisory board's charter. The charter involves identifying federal impediments to IoT adoption.
- iv. The IoT advisory board had eight meetings over the course of 2023. The board will have one last meeting for 2023 and they plan to release an updated charter following the December meeting. A final report will become available January or February of 2024.
- v. Visit the <u>website</u> to view recordings and obtain access to meeting materials such as minutes and draft recommendations.
- vi. As members were putting together draft recommendations, workforce shortages came up as a common topic among all market sectors. Specific topics that kept surfacing were: lack of sufficient digital skills in the existing workforce, merging of IT and OT worlds creates critical skills deficits, and the lack of expertise to address integration and interoperability challenges. Advisory board members also identified geographic challenges for smaller cities and rural communities to attract talent.
- vii. A major theme on the recommendations is fostering an IoT-ready workforce.
- viii. Comments and recommendations for the IoT Advisory Board can be sent to barbara.cuthill@nist.gov.
- ix. Comments and recommendations for the IoT Federal Working Group can be sent to IoTFWG@nist.gov.

b. Strategy Stories – New Developments that align to NICE Strategic Plan

Department of Administrative Services - Ohio Digital Academy
Presented by Justin Ackerman, Ohio Digital Academy & IT Workforce Initiatives
URL: https://careers.ohio.gov/ and https://das.ohio.gov/

- i. The High School Technology Internship Program provides employers of the State of Ohio \$5,000 per intern that they hire. This is for a minimum of 120 hours of employment at \$12 an hour.
- ii. The State of Ohio has a new initiative called the Ohio Teacher Bootcamp Program which provides \$200,000 per grant. This can be awarded to a higher education college or university, or an Ohio Technical Center. This initiative is designed to provide an upskilling or reskilling opportunity for 8-12th grade teachers related to in demand tech fields such as cybersecurity.
- iii. Additionally, the State of Ohio has the Ohio Tech Credential Program which is a reskilling and upskilling program for employers across the state of Ohio, which allows for \$30,000 per funding round and \$2,000 per credential for each employee.
- iv. The Ohio Department of Administrative Services has a federally registered cybersecurity apprenticeship program. Their apprentices rotate throughout different program areas in cybersecurity.
- v. Throughout the Ohio Department of Administrative Services agency, they have implemented cybersecurity certifications incentives based on merit as well as obtaining and maintaining cybersecurity certifications.
- vi. The Ohio Digital Academy (ODA) seeks to create an IT workforce pipeline by training and employing early entrants to the industry and setting them on a path for a successful career in high demand fields. This program is a three-year service commitment to the State of Ohio. Analysts will immediately earn \$25 an hour and attend an intensive four-week tech bootcamp in their chosen field.
- vii. ODA will recruit individuals completing relevant bootcamps from Ohio and other states or from relevant degree programs bi-annually.
- viii. Secondarily, ODA will recruit individuals with no experience but an aptitude for related positions and award tuition reimbursement agreements to attend related bootcamps or degree programs.
- ix. ODA will hire bi-annually, and their first cohort will start January 2024. The first cohort will consist of 10 analysts.
- x. Ohio 2022-2023 Innovative Workforce Incentive Program Qualifying Industry-Recognized Credentials <a href="https://education.ohio.gov/getattachment/Topics/Ohios-Graduation-Requirements/Industry-Recognized-Credentials/Innovative-Workforce-Incentive-Program/2021-2022-Innovative-Workforce-Incentive-Program-Qualifying-Industry-Recognized-Credentials-All-1.pdf.aspx?lang=en-US
- c. Framework Feature Applications and Uses of Workforce Framework for Cybersecurity

Capturing Individual Cyber Readiness through KSAT mapping of Industry and Academia Cybersecurity Curricula

Presented by Eileen Acosta, New York University (NYU)

 The project involves mapping university cybersecurity curricula to the NICE Workforce Framework for Cybersecurity (NICE Framework) and its 52 distinct Work Roles through the respective Knowledge, Skill, Ability, and Task

- statements (KSATs) and creating a database to compare the curricula from different educational institutions.
- ii. The project facilitates evaluation of new professionals by employers, potential roles by applicants, and curriculum by academic institutions.
- iii. An additional concept is that mapping courses to the NICE Framework results in a more intuitive and organized educational landscape, thereby facilitating the communication among educators, students, and employers.
- iv. The group has identified industry, academic, and federal stakeholders who have interest in the project. The group has begun to look at NYU Cybersecurity Curriculum and Syllabi to start KSAT mapping for Graduate level courses.
- v. Some of the challenges the group faces are that the NICE Framework updates will be out by end of calendar year 2023 for coordination. The Abilities portion of the KSATs will be merged with Knowledge, Skills, and Tasks. This means some of the KSATs will change and mapping data will change. Currently there is no methodology for mapping. The group will have to develop their own methodology.
- d. Research Review- Driving Research on Effective Practices

SANS | GIAC Workforce Study

Presented by Brian Correia, GIAC SANS Institute

- i. The SANS/GIAC Workforce Study will be available to the public in January 2024.
- ii. In effort to complete they Study; a survey was directed towards security team leads and hiring managers. The survey focused on the hiring and recruitment of cybersecurity staff. The goal of the survey was to focus on the skills and expectations of the cybersecurity workforce, not necessarily the headcount of how many individuals were hired.
- iii. The Study focused on 5 Work Roles from the NICE Framework and used CyberSeek as a tool to conduct the research.
- iv. The goal of the workforce study focused on how individuals hire, how to retain workers, whether or not technical workers and human resources are talking the same language, and how diversity it built in.
- v. A few takeaways few the Study were that teams are effective, a blend of both on-the-job training and traditional training, standardizations are hindering the hiring process, upskilling is better, and over 70% of employers have diversity programs.

IV. Working Group Updates

a. Promote Career Discovery

Co-chair: Keith Davis, Koinonia Family Life, Inc.

- i. No update provided.
- b. Transform Learning Process

Co-chair: Dr. Donna Schaeffer, Marymount University

 The group has 3 project teams who will focus on providing deliverables to support the NICE Strategic Plan Goal 2.6 (Champion the development and recognition of teachers, faculty, and instructors as part of the in-demand workforce).

- a. 2.6.1 Determine the scope and significance of the cybersecurity educator workforce gap. Sub-Project Lead: Mike Morris.
- b. 2.6.2 Influence policies that enable hiring and retention of qualified and diverse educators. Sub-Project Lead: Jasmine Jackson.
- c. 2.6.5 Explore expansion of NICE Framework to include competencies or work roles for cybersecurity educators. Sub-Project Lead: Jessie Bolton.
- ii. Website: https://www.nist.gov/itl/applied-cybersecurity/nice/community/community-coordinating-council/transform-learning-process
- iii. Next meeting: December 12, 2023, at 2:00 p.m. ET
- c. Modernize Talent Management

Co-chair: Jo Justice, Leidos

- i. The group has put together new project team that is exploring the topic of talent retention. A final deliverable of the project will be a discussion guide to be used by hiring managers and employers to discuss common issues that cause people to leave.
- ii. A charter for the new project team is under review and will be available soon.
- iii. The group is seeking additional volunteers to help with the new project.
- iv. Website: https://www.nist.gov/itl/appliedcybersecurity/nice/community/community-coordinatingcouncil/modernize-talent-management
- v. Next meeting: December 21, 2023, at 1:00 p.m. ET

V. Community of Interest Updates

- a. Apprenticeships in Cybersecurity Staff: Marian Merritt, NICE
 - Carolyn Renick shared a webinar event <u>Employers: Expand Your Connections to Veteran Talent</u> that was to be held November 17 and a podcast Promoting Registered Apprenticeships to Attract Veteran Talent.
 - ii. Mark Ouellette shared a webinar event that is coming up on November 30
 Uplifting Strategies to Engage Tribal Youth in Registered Apprenticeship Programs.
 - iii. There was a lively discussion on topics that the community would like to hear from in the near future such as Native American Apprenticeship programs, and VETS and Apprenticeships.
 - iv. Marian mentioned the upcoming National Governor's Association (NGA) meeting which was to be held during National Apprenticeship Week. Katie, from Safal Partners presented at the recent NGA Cybersecurity Credentialing & Education Forum during National Apprenticeship Week in DC. Approximately 20 states were in attendance for the session, which was moderated by the Business Roundtable.

- v. Website: https://www.nist.gov/itl/applied-cybersecurity/nice/community/community-coordinating-council/apprenticeships
- vi. Next meeting: December 8, 2023, at 11:00 a.m. ET

b. Cybersecurity Career Ambassadors

Co-chair: Connie Bragg, AT&T Services

- i. The Cybersecurity Career Ambassadors officially had their first meeting in November.
- ii. The Cybersecurity Career Ambassador Program seeks to create a network of volunteers through employers, educators, and others who serve as champions to prepare, grow, and sustain a diverse and skilled cybersecurity workforce.
- iii. Next information sessions on how to become an ambassador are Tuesday, 12/19/23 at 1pm-2pm EST and Tuesday, 1/16/24 at 6pm -7pm EST.
- iv. Website: https://www.nist.gov/itl/applied-cybersecurity/nice/community/community-coordinating-council/cybersecurity-career
- v. Next meeting: December 8, 2023, at 1:00 p.m. ET

c. Cybersecurity Skills Competitions

Co-chair: David Zeichick, California State University, Chico

- i. Brad Wolfenden from US Cyber Games presented to the group.
- ii. The members are work on creating a website to list all the available cybersecurity competitions. Now, they are working to add a filter feature which will allow individuals to quickly find competitions.
- iii. The group will be demoing the website at the NICE K12 Conference in Phoenix, AZ. Stop by the NICE booth, co-chair David Zeichick will be representing the Competitions COI.

d. K12 Cybersecurity Education

Co-chair: Thomas Trevethan, Palo Alto Networks

- i. Lela Bowman, Senior Program Manger of Minecraft Education, shared to the group about their new Minecraft cybersecurity curriculum and activities.
- ii. The group received updates of the Ambassador Program, the NICE K12 Conference, and the K12 Professional Development Series.
- iii. The group discussed potential meeting times for 2024.
- iv. Website: https://www.nist.gov/itl/applied-cybersecurity/nice/community/community-coordinating-council/k12-cybersecurity-education
- v. Next meeting: at the NICE K12 Conference in Phoenix, AZ.

e. Diversity and Inclusion

Staff: Susana Barraza, NICE

- The group has identified three new projects: defining our Community of Interest Diversity, Equity, Inclusion, and Accessibility (DEIA) definition, and Mentorship Guide for Employers.
- ii. The group will meet every 2nd Friday of the month at 2PM starting January 2024.

- iii. Website: https://www.nist.gov/itl/applied-cybersecurity/nice/community/community-coordinating-council/diversity-and-inclusion
- iv. Next meeting: December 15, 2023 at 11:00 a.m. ET

f. NICE Framework Users

Staff: Mike Prebil, NICE

- On Thursday, November 30, 2023, at 2PM ET the NICE Framework Users Group open call will be exploring how cybersecurity skills competitions use the Framework.
- ii. They will have guests from four leading competitions—US Cyber Games,
 National Cyber League, Cybersecurity and Infrastructure Security Agency's
 President's Cup, and Dept. of Energy's CyberForce® Program. They will be
 talking about how they use (or would like to use) the NICE Framework in their
 programming.
- iii. Framework Users Group: https://www.nist.gov/itl/applied-cybersecurity/nice/community/community-coordinating-council/nice-framework-users

VI. Project Progress Reports

a. NICE Conference and Expo (Dallas, Texas) – June 3-5, 2024
 Presented by Cesar Cebot, Florida International University
 URL: https://niceconference.org/

- i. Call for proposal reminders have been sent out to the community. Topics of interest have been updated on the website. Explore topics here.
- ii. The recording of the Regional Initiative for Cybersecurity Education and Training (RICET) event is now available on YouTube.
- iii. A limited block of discounted rooms will be available at a prevailing government rate of \$164/night (room rate does not include tax or any applicable fees).
- b. US Cyber Games (USCG)

Presented by Brad Wolfenden

URL: https://www.uscybergames.com/

- i. The US Cyber Team took home second place at the European Cybersecurity Challenge in Hamar, Norway.
- ii. USCG will be hosting an international scrimmage on Saturday, January 27. The event will be livestreamed.
- iii. The Wicked6 24-Hour Virtual Global Hack & Chat Event, plus an All-Women's Tournament will take place March 29-30, 2024. There are registration discounts available for educators and students who register by December 31st. Learn more and register here.

VII. Featured Topic

New CyberSeek Data
Presented by Will Markow, Lightcast
URL: https://www.cyberseek.org/

- CyberSeek provides interactive tools to enable users to learn more about the cybersecurity workforce within the region as well as explore different types of career opportunities and pathways within cybersecurity.
- ii. There are about 572,000 job openings for cybersecurity jobs that were posted over the past 12 months within the United States. There are currently about 1.1 almost 1.2 million existing cybersecurity workers.
- iii. There has been a broader hiring pull back across the entirety of the market over the past 12 months. Many organizations have grappled with economic uncertainty stemming from rising interest rates and inflation.
- iv. Data suggest that cybersecurity roles and demand for cybersecurity workers is still far more robust and resilient than other fields despite the economic uncertainty. The data has shown a decrease in job openings coupled with the increase in employment, which is a positive indicator that employers are making headway in filing many cybersecurity jobs.
- v. A new feature on the CyberSeek website is the optimized job descriptions. This was added with the intent to help organizations make it as easy as possible to take a skilled based approach rather than simply a degree-based approach to hiring for cybersecurity roles. These are job descriptions that people can cut and paste that have already been optimized for the skill set that we find are most relevant within each of the roles. Additionally, there is a link to a job posting optimizer which allows users to customize their security roles or other IT roles and build out optimized job descriptions for those that are informed by market data about what types of skills and requirements are most important to include within those job descriptions.
- vi. Last, CyberSeek has updated the data within the education and training provider map. The map now includes one to two fields within the program type, so it becomes easier to identify remote opportunities for training regardless of where the individual is located.

VIII. Closing Remarks and Next Meeting Reminder

The next NICE Community Coordinating Council Meeting will be **January 23, 2024** at 3:30 p.m. ET.