NICE Community Coordinating Council
Meeting Minutes

February 24, 2021 | 3:30-5:00 p.m. ET

I. Introduction and Ground Rules

NICE Program Manager Susana Barraza welcomed everyone to the meeting and provided an overview of the council and its purpose. She encouraged everyone to engage with the speakers via the chat space and noted that the meeting is not intended for commercial or promotional use.

II. Opening Remarks

a. Industry Co-Chair: Jon Brickey, Senior Vice President, MasterCard
   - There was a cybersecurity-related incident earlier in the day involving the Federal Reserve. Apparently, it did not involve hacking, but rather human error.
   - The Cybersecurity Talent Initiative, a public-private tuition reimbursement program, is looking for new industry partners. Industry sponsorship has dropped significantly. The program enhances the cybersecurity workforce pipeline by recruiting and training students, who receive student loan assistance. Participants are given a 2-year placement at a federal agency and then are invited to apply for a full-time position in the private sector. Contact Jon if you are interested in learning more.

b. Academic Co-Chair: Marni Baker-Stein, Chief Academic Officer and Provost, Western Governors University
   - The Department of Labor estimates that higher education institutions have shed at least 650,000 employees in 2020 – the biggest drop since the 1950s.
   - President Biden proposed cancelling a portion of student loan debt and called on Congress to pass legislation to that effect.
   - There has been a drop in FASA applications for first-time students, which is a direct hit to equity because the greatest decline is in lower income areas.
   - The number of students applying for early decision nationally is decreasing. The overall number for early action fell by 5%, but that number varies depending on the size of the institution. Overall, college enrollment has declined by 2.5%, and community colleges have suffered most. More affluent counties are feeling less of the loss.
• A recent study looking at IT programs showed that enrollments have grown at a higher rate in the IT fields than any other area during the pandemic.

c. Government Co-Chair: Rodney Petersen, Director of NICE

• The Biden administration is staffing up and has announced its top priorities: American Rescue Plan, Covid-19, Climate, and Racial Equity

1. Prioritization of the economy puts an emphasis on jobs growth and putting displaced workers into good jobs, including cybersecurity and IT roles. This will impact cybersecurity career pathways – one of the NICE strategic goals.
2. The attention to Covid-19 offers an opportunity to reexamine what “business as usual” will look like in the future. For example, will we continue to print and use paper as we did in the past now that we’ve been operating digitally for the past year? The pandemic has put a spotlight on broadband access, and there will be further discussions about online learning and working experiences.
3. The prioritization of racial equity provides an opportunity for the NICE community to double down on expanding inclusion and diversity.

• The nominee for Secretary of Commerce is Governor Gina Raimondo of Rhode Island, and during her confirmation hearing the issue of cybersecurity came up. Rhode Island has been active in jobs creation, workforce development, and educational issues.

III. Standing Items

a. Strategy Stories - New Developments that Align to NICE Strategic Plan

*Cybersecurity Inclusive Pathways toward Higher Education and Research (CIPHER)*

Presented by Dr. Hongyi “Michael” Wu, Director, School of Cybersecurity, Old Dominion University


• Demands and Challenges: In general, higher education is reacting quickly to the need for a large cybersecurity workforce and expanding cybersecurity programs, but there is still a significant gap between k-12 and college education in cybersecurity. Funding for scholarships has been really helpful.

• Challenges to Achieve Diversity and Inclusion
1. Implementation: Where to fit it into the K-12 curricula and how to ensure time allocation and resources and infrastructure.

2. Student Access: How to ensure students with different socioeconomic status have equal access to curricula, teachers, resources and infrastructure. How to assess students and support mobility.

3. Teacher Preparation: How to ensure teachers have access to solid curriculum and learning resources. How to prepare competent teachers.

4. Partnership and Coordination: There are no standardized articulations between elementary schools, middle schools, high schools, community colleges and 4-year universities; there is no guarantee that all teachers adhere to one philosophy regarding the teaching of cybersecurity; no guarantee that students at the same grade level are introduced to the same academic content and skills.

   - In response to a question, Dr. Wu said it would be great for his program to connect more closely with the NICE community and he will send an invitation to their next meeting.

b. Report Roundup - Learning from Good Ideas

   **NASCIO Cybersecurity Study**
   Presenting by Meredith Ward, Director, Policy & Research, National Association of State Chief Information Officers (NASCIO)

   URL: [https://www2.deloitte.com/content/dam/insights/us/articles/6899_nascio/DI_NASCIO_interactive.pdf](https://www2.deloitte.com/content/dam/insights/us/articles/6899_nascio/DI_NASCIO_interactive.pdf)

   - The NASCIO Cybersecurity Study, in its 10th year, looks at the role of state CISOs, their budget, governance, reporting, workforce, and operations. It is a comprehensive report, and they have 10 years of data to examine. The key takeaways:

     1. COVID-19 has challenged continuity and amplified gaps, creating more of a risk landscape.
     2. Operating in “silos of excellence” is not realistic. Collaboration with local governments and public higher education is critical to managing increasingly complex cybersecurity risk within state borders.
     3. A centralized structure helps CISOs position cybersecurity in a way that improves agility, effectiveness, and efficiencies. States with centralized CIO organizations were better able to pivot to remote work.
• In the cybersecurity workforce, the leading outsourced cybersecurity functions are cyber threat risk assessments (60%), security operations center (42%), and forensics/legal support (40%). The top talent management practices to attract and retain the cybersecurity workforce are promoting non-salary benefits, highlighting greater stability, and offering internship programs.

• To learn more, email Meredith at: mward@nascio.org

c. Framework Feature - Applications and Uses of Workforce Framework for Cybersecurity
   NICE Framework Success Stories
   Presented by Karen Wetzel, Manager, NICE Framework

   • Success Stories: Organizational profiles that illustrate drivers, process, a tie-in with the NICE Framework, benefits, and impact. These stories provide an opportunity for people wondering how their organization can use the Framework to see how others are using it.

   • NICE has already recorded some success stories and would like to profile organizations from different sectors. If you have a story to share, submit it at niceframework@nist.gov or contact Karen at karen.wetzel@nist.gov

   • In response to a question about including competencies in the success stories, Karen said they are not currently part of the profile but probably will be soon.

d. Research Review - Highlighting Research Results or Topics for Further Study
   Cybersecurity Skills Journal: Practice and Research
   Presented by Laurin Buchanan, Principal Investigator Secure Decisions
   URL: https://www.nationalcyberwatch.org/cybersecurity-skills-journal-practice-and-research/

   • Rather than highlighting research, Laurin said the cybersecurity education community should highlight systematic investigations. There are a lot of informal results around the objectives in NICE Strategic Plan Goal 5, but data-driven evidence about effective and proven practices is critical.

   • Evidence-based systematic investigations: The cybersecurity community lacks experience designing, conducting and documenting evidence-based studies into human factors and performance. There is a need to leverage lessons that have been learned in other domains, such
as healthcare, and identify what works, why, and under what conditions. It is also important to share what didn’t work and learn from failures. Results need to be disseminated more widely.

- Cybersecurity Skills Journal: They are seeking studies on Practice, Research, and Education topics to advance the current understanding or capability of humans in the cybersecurity loop; analyze, evaluate, improve, and measure techniques, tactics and procedures (TTPs); design and deployment of instructional systems that raise capability maturity.

- They are issuing a call for abstracts for an upcoming special issue, *Diversifying the Cybersecurity Workforce*. Diverse perspectives are essential for driving innovation and addressing the skills gap. If you have models, data, systematic, review, cases, or instructional designs that suggest how the nation can succeed in diversifying the cybersecurity workforce, let them know.

- Submit your idea by September, and include the problem and research question. They take a highly collegial approach and try to find a way to work with authors to ensure scholarly rigor. Submit an abstract at: https://nationalcyberwatchcenter.wildapricot.org/event-4157377

IV. Working Group Updates

a. Promote Career Discovery  
   Roland Varriale II, Cybersecurity Analyst, Argonne National Laboratory

   - The Promote Career Discovery Working Group will perform an environmental scan as a first order of business. They are looking for people to join the group and provide a diverse look at different pathways.

   - Next meeting: Wednesday, March 17, 2021, 3:30 p.m. ET

b. Transform Learning Process  
   Richard Spires, Instructor, Learning Tree

   - The Transform Learning Process Working Group held the first meeting 2 weeks ago and will meet every other week to build momentum. They welcome new members.

   - Next meeting: Wednesday, March 10, 2021, 3 p.m. ET

c. Modernize Talent Management  
   Karen Jensen, Saaby Consulting
• The Modernize Talent Management met for the first time recently and will focus initially on building project teams to take on the goals in smaller groups. They welcome new members.

• Next meeting: Thursday, March 18, 2021, 1 p.m. ET

V. Community of Interest Updates

a. Apprenticeships in Cybersecurity
   Tony Bryan, Executive Director, CyberUp

   • The Apprenticeships in Cybersecurity COI is reviewing its charter as a newly structured community of interest.

   • Next meeting: Friday, March 26, 2021, 11 a.m., ET

b. Cybersecurity Skills Competitions
   Amelia Phillips, Highline College

   • The Cybersecurity Skills Competitions COI met the previous Thursday. They are reviewing their charter and polishing up three recently completed projects.

   • Next meeting: Thursday, March 18, 2021, 3 p.m. ET

c. K12 Cybersecurity Education
   Laurin Buchanan, Secure Decisions

   • The K12 Cybersecurity Education COI started introducing each meeting with an interactive activity that educators can use to introduce a topic. They are working to identify gaps that will guide them to a roadmap.

   • Next meeting: Wednesday, March 10, 2021, 3:30 p.m. ET

d. NICE Framework Users
   Karen Wetzel, Manager of the NICE Framework

   • The NICE Framework Users COI, formed at the end of January, now has 120 members.

VI. Project Progress Reports

a. NICE Conference and Expo
   Presenter: Randy Pestana, Florida International University
   URL: https://niceconference.org/

   • Save the Date: June 6-8, 2022, at the Westin Peachtree Plaza in Atlanta, Georgia

   • The conference theme will be revealed soon.
b. NICE K12 Cybersecurity Education Conference
Presenter: Felicia Rateliff, Director of Operations & Programs, iKeepSafe
URL: https://www.k12cybersecurityconference.org/

- **Save the Date: December 6-7, 2021**
  The NICE K12 conference will be virtual again this year because of the continued impact of Covid-19 on educators, including travel restrictions and budgetary restrictions and because the 2020 virtual conference was a very successful event.

- **Key Dates:**
  1. March 25: First planning committee meeting
  2. Early to mid-April: Call for speaker proposals opens
  3. Late June: Call for speaker proposals closes
  4. Mid-August: Early bird registration opens; agenda goes live
  5. Late October: Early bird registration closes
  6. December 4-5: Pre-conference workshops

- Conference planners are seeking sponsors and exhibitors. An exhibitor virtual booth is $750 for for-profit companies and $500 for nonprofit organizations.

- Registration: $125 for early bird and government attendees; $150 regular price. (All conference content will be available to attendees for 1 year after the event.) Scholarships will be available for educators.

- For more information, email Felicia at: conference@ikeepsafe.org

c. Centers of Academic Excellence (CAE) in Cybersecurity Community
Presenter: Amy Hysell, California State University, San Bernardino
URL: https://www.caecommunity.org/

- **Upcoming Events:**
  1. May: Virtual Executive Leadership Forum
  2. September 17: National Cybersecurity Virtual Career Fair: Open to all CAE students and alumni. They are looking for industry partners to host a booth – it’s free.
  3. June 2022: Community Symposium event

VII. **Closing Remarks and Next Meeting Reminder**
• Rodney thanked the speakers and participants for joining the meeting. If anyone has a Strategy Story, Recent Report, Framework Story, or Research to share, contact the NICE team.

• The next NICE Community Meeting will be on March 24, 2021, at 3:30 p.m. ET