The Challenge

Workforce frameworks provide employers, learners, and training and education providers a common language to describe the work of a particular domain along with defining what workers need to know or be able to do to complete that work. However, without a consistent model for these workforce frameworks to follow, they are at risk of being developed separately and inconsistently, resulting in narrow adoption and limited application. As organizations aim to improve workforce efforts in and across various fields – including cybersecurity, privacy, data sciences, and artificial intelligence – the existence of a standardized and agreed-upon framework model is key towards ensuring both broad adoption and effective use.

The Opportunity

A standardized workforce framework model can facilitate harmonization for a range of workforce frameworks, both in terms components and the process followed. The creation of a framework playbook provides a template for other organizations to use and serves as a reference resource pointing to frameworks that have used the model for comparison and sharing of leading practices. By implementing core building blocks (Tasks, Knowledge and Skill Statements), an approach described in the National Initiative for Cybersecurity Education (NICE) Workforce Framework for Cybersecurity (NICE Framework), the frameworks become agile, flexible, interoperable, and modular. The building blocks approach forms the start of a playbook that is further supplemented by two additional resources: the Task, Knowledge, and Skill (TKS) Statements Authoring Guide for Workforce Frameworks (a joint effort with NICE and Privacy Engineering Program at the National Institute of Standards and Technology) and NISTIR 8355, NICE Framework Competencies, which provides additional information regarding what competencies are and how they can be used. These resources provide a strong footing to the creation of a common framework model that can help answer not only the why and the what but the who and the how.

Future Vision

A Playbook for Workforce Frameworks would include the following elements:

- Model Framework Structure
  - Building Blocks: Task, Knowledge, and Skill (TKS) Statements
  - Sample Uses: Competencies, Work Roles, Teams
  - Optional Components: Proficiency Levels, Capability Indicators, Credentials
- Guidance on How to Write TKS statements, Competencies, and Work Roles
- A Workforce Framework Template
- Effective Practices for Workforce Framework Development and Stakeholder Engagement