



## PROFILE

Computer Scientist  
Information Technology Laboratory  
U.S. Army Engineer Research and  
Development Center

## CITATION

Rising developer and researcher who has pioneered tools providing innovative solutions to ensure the sustainability and success of Army Missions

# INDU SHUKLA

## Asian American Most Promising Engineer of the Year

Ms. Indu Shukla is a Computer Scientist, Information Technology Laboratory, U.S. Army Engineering Research and Development Center (ERDC). As a Computer Scientist she has passion for Machine learning and Data science. She has been a lead developer and researcher in building state-of-the-art applications and delivering innovative and cutting-edge Artificial Intelligent (AI) and Machine Learning (ML) solution to the enterprise. She earned a Bachelor's degree in Computer Science from Jackson State University, and a Master's degree in Computer Science and Engineering from Mississippi State University (MSU). She joined ERDC in 2010 as a Computer Scientist.

As a lead application developer and researcher, she has pioneered tools providing innovative solutions to ensure the sustainability and success of Army missions. She is currently focused on the development of AI/ML based solution to Army's problem such as real-time monitoring, fault diagnosis and health management of army's assets using High-Performance Data Analytics (HPDA) for predicting the likelihood of imminent failure. She is also currently involved in research and development of smart facilities creating data-rich digital twin models to perform predictive analysis to detect anomalies in facility infrastructure systems.

Indu finds the field of research and development enormously rewarding. She is passionate about promoting younger generation in STEM career. She has participated in outreach activity to mentor youth and educate kids to promote STEM career. She served as a judge for the FIRST Robotics competition, mentored students and provided hands on experience on programming and development.

In her free time, she enjoys hiking, gardening and bird watching.

