NCSD Mentor Match Program

Purpose and Description

The overall mission of the ANS/NCSD Education Committee is "To promote development of nuclear criticality safety expertise by providing opportunities that offer technical growth and recognition." The NCSD Mentor Match program, which leverages a modular framework to connect mentors and mentees based on past experience, desired skillsets, and communication preferences, seeks to facilitate this mission. A more experienced criticality safety engineer specialist (i.e., Mentor) can educate / coach the lesser-experienced criticality safety engineer specialist (Mentee/Trainee/Engineer). Mentorship is not based on NCS qualification milestones of the mentee, but rather on developing desired skillsets and optimizing communication preferences for both the Mentor and Mentee. NCSD Mentor Match allows participants to focus on various areas that include both technical and soft skills. The program will also identify expectations for participants.

Benefits to a Modular Framework

The modular aspect of the NCSD Mentor Match Program offers the best of mentoring approaches by utilizing traditional content of NCS Industry such as past experience or best practices/lessons learned, but altering structure, schedule, and focus areas. This is done by prioritizing desired skillsets and communication preferences in the matching process versus requiring large time commitments or rigidity of structure. It can be noted that this approach allows participants to be mentors and mentees in different areas at the same time. The modular framework of the program allows for pairing across sites and even countries.

Communication Preferences

Communication preferences for this program are up to the participants to determine. Options include in-person (whether at a conference or a shared site) or online (whether through video or teleconferencing, or email). The multiple communication options will allow individuals at different sites to connect.

Desired Skillsets / Focus Areas

Mentorship can be effectively used to develop a range of technical or soft skills. The following provides some examples of the skills, although this is not intended to be an exhaustive list.

- Process analysis and hazard identification
- Best practices and lessons learned
- Safety culture and questioning attitude
- Non-compliance response
- Control development/implementation

- Conducting walkdowns, assessments, benchmarking
- Writing NCS evaluations
- Responding to reviewer and/or regulator questions/comments
- Criticality Accident Alarm Systems(analysis and/or determination of need)
- Software Validation

- In situ experiments
- Work/life balance
- Teaching/educational instruction
- Hand calculations
- Presenting (e.g., ANS meetings)
- Critical experiments (design, performance, role in NCS field)
- Understanding and using ANS standards
- NCSD Committee / Officer Roles

- Calculational methods
- Emergency Response/planning
- Non Destructive Assay
- Defense in Depth
- Interdisciplinary interface (nuclear safety, operations, ANS-1, fire safety, etc.)
- Use of moderator controls and/or neutron absorbers

If there is a skill or focus area that has not been listed, you can choose "other" and fill in the corresponding field in your application.

Attributes of an Effective Mentor
As well as being knowledgeable in the areas that the mentee is looking to develop, the following attributes are important:
- Professional in the Nuclear Criticality Safety Community
- Coach, teacher, team-builder, and advisor with the ultimate goal to empower the mentee to develop their desired skills and abilities.
- Traits of being open, approachable, good listener, patient, and encouraging
- Accepting of own limitations and mistakes
- Commitment and dedication to the development of the Trainee and the mentorship program
- Exhibits traits of trustworthy, honesty, and integrity
- Dedication to pursuit of beneficial contribution to nuclear criticality safety
- Ability to shape attitude and philosophy by actions and example
- Knowledge on the use of the ANS-series 8 standards, general NCS reference documents, nuclear safety culture and general safety principles.
- Willingness to give the time needed for mentorship program

Attributes of an Effective Mentee

- Having the education and /or experience commensurate with responsibilities
- Willingness to listen and learn
- Willing to share new discoveries with a Mentor
- Willing to ask questions and admit lack of knowledge
- Energetic in pursuit of knowledge
- Desire to excel in the nuclear criticality safety field
- Desire to obtain "qualifications" to contribute to nuclear criticality safety
- Willingness to give the time needed for the mentorship program
- Desire to be active in the Nuclear Criticality Safety Division of the ANS
- Exhibits traits of trustworthy, honesty, integrity, and questioning attitude

Expectations

The Mentor and Mentee understand and acknowledge the following:

- The relationship is for educational purpose and guidance.
- The Mentor and Mentee voluntarily agree to keep the relationship and communications confidential from all third parties, unless otherwise agreed upon.

Steps to Complete Mentor/Mentee Enrollment Online

1. Complete your member profile (which is populated with some of your membership information) online so that potential mentors/mentees can learn more about you. Include information in your bio and details of your job history.
2. Make selections for your preferences in communication and desired skillsets / focus areas. *Please note, the more information you provide, the easier it will be to find your best match.

NCSD Mentor Match Online Application

Name: _____ Date: _____

Employer/Site: _____ Job Title: _____

Email: _____ Phone: _____

Biography:
Please include information on your career history, which may consist of 2-3 sentences on your educational or experiential background, your NCS Qualifications.

Indicate which role(s) you would like to participate in: ☐Mentor ☐Mentee

Please include 2-3 sentences why you would like to be a mentor/mentee. If you would like to participate as both mentor and mentee (in individual focus areas, please fill out separate applications to apply as a mentee and as a mentor)

Desired Skillsets / Focus Areas:

- ☐ Process analysis and hazard identification
- ☐ Best practices and lessons learned
- ☐ Safety culture and questioning attitude
- ☐ Non-compliance response
- ☐ Control development/implementation
- ☐ In situ experiments
- ☐ Work/life balance
- ☐ Teaching/educational instruction
- ☐ Hand calculations
- ☐ Presenting (e.g., ANS meetings)
- ☐ Critical experiments (design, performance, role in NCS field)
- ☐ Understanding and using ANS standards
- ☐ NCSD Committee / Officer Roles
- ☐ Other

- ☐ Conducting walkdowns, assessments, benchmarking
- ☐ Writing NCS evaluations
- ☐ Responding to reviewer and/or regulator questions/comments
- ☐ Criticality Accident Alarm Systems(analysis and/or determination of need)
- ☐ Software Validation
- ☐ Calculational methods
- ☐ Emergency Response/planning
- ☐ Non Destructive Assay
- ☐ Defense in Depth
- ☐ Interdisciplinary interface (nuclear safety, operations, ANS-1, fire safety, etc.)
- ☐ Use of moderator controls and/or neutron absorbers

Indicate which method of communication you prefer: ☐In-person ☐Email ☐Video-conferencing ☐Phone

Questions/Comments/Suggestions: