

NSF-Oakton STEM Fellowship

The American workforce is in critical need of educated workforce in core and related fields of Science, Technology, Engineering and Mathematics (STEM). Oakton Community College, in cooperation with the National Science Foundation, is offering NSF-Oakton STEM Fellowship to encourage students explore STEM careers, pursue studies, and receive postsecondary degrees in STEM disciplines. Students interested in exploring a career in STEM and completed basic requirements will become qualified for the Fellowship. The NSF-Oakton STEM Fellowship is offered through three programs:

- **STEM Enrichment Program (SEP)** for students who will take MAT052, MAT120, COL101, EGL101 and EGL102,
- **STEM Mentoring Program (SMP)** for students who cannot join SEP, and
- **STEM Study Sessions (S³)** for students who have completed higher levels of STEM courses.

STEM Enrichment Program (SEP)

This program will support students in five courses, MAT052 (Elementary Algebra), COL101 (College Success Seminar), EGL101 (Composition I), EGL102 (Composition II), and MAT120 (Intermediate Algebra). As tandem courses, MAT052 and COL101 must be taken at the same time. Contents of these courses are woven with study skills and rich materials in STEM to enhance students' learning and increase students' interests in these areas. Participants will receive the following benefits:

- \$800 NSF-Oakton STEM Fellowship (\$400 in fall; \$400 in the following spring),
- Opportunity for an additional \$400 NSF-Oakton STEM Fellowship in the following academic year through the STEM Mentoring Program,
- Prompt and individualized faculty mentoring support,
- Academic & career exposure through speakers, workshops, club activities, & field trips,
- Excellent instruction of MAT052, MAT120, COL101, EGL101, and EGL102 courses.

Requirements for participation in SEP

All participants are required to:

- Meet with an assigned mentor 6 times during the semester.
- Attend approved educational and career workshops, speakers, club activities, and field trips 4 times.
- In fall semester, **MAT052** Elementary Algebra students must register for and attend MAT052 and COL101-001. **EGL101** students must register for and attend EGL101.
- In spring semester, **MAT120** Intermediate Algebra students must register for and attend MAT120-004. **EGL102** students must register for and attend EGL102-006.

Apply online at: http://www.oakton.edu/nsf-stem/sep_form.htm or download the application PDF file at <http://www.oakton.edu/nsf-stem/ApplicationSEP.pdf>.

For more information, contact Dr. Wang at tingxiu@oakton.edu or 847-635-1751.

Participants in SEP are not eligible for the SMP Fellowship. Participants must also be a U.S. citizen or a permanent resident to qualify.

Director:

Tingxiu Wang,
tingxiu@oakton.edu,
847-635-1751

Co-Directors:

Joe Kotowski, koto@oakton.edu, 847-635-1861
Gloria Liu, glorial@oakton.edu, 847-635-1738
Bob Sompolski, somplski@oakton.edu, 874-635-1690



STEM Mentoring Program (SMP)

This program supports students taking upper level STEM courses. Participants will receive the following benefits:

- \$400 NSF-Oakton STEM Fellowship (\$200 in fall, \$200 in the following spring),
- Receive prompt and individualized assigned faculty mentoring support,
- Learn about academic and career opportunities through special speakers, workshops, club activities, and field trips, and
- Improve leadership skills through active participation of student STEM organizations.

Upper level STEM courses include: BIO121, 122, 151, 240; some or most of CAD, CIS, CNS, WWW; all CSC, EAS, ELT, ENG, FME, GEG, IDE, MEC, MFG, MTA; CHM121 and up; MAT149 and up; PHY 115 and up.

Apply online at: http://www.oakton.edu/nsf-stem/smp_form.htm or download the application PDF file at <http://www.oakton.edu/nsf-stem/ApplicationSMP.pdf>.

For more information, contact Dr. Wang at tingxiu@oakton.edu or 847-635-1751.

Participants in SMP are not eligible for the SEP Fellowship. Participants must also be a U.S. citizen or a permanent resident to qualify.

STEM Study Sessions (S³)

In collaboration with the Honors Program and the Learning Center, S³ trains honors students who are taking, or have taken higher level courses* of STEM to become tutors. As an honors project, an S³ participant will participate in ten-weeks training session focusing on student learning styles, instructional strategies for strengthening students' academic performance, specific learning theories and techniques, data collection, confidentiality, interacting with faculty members, and active peer collaboration in processing course materials. They will be assigned to observe a STEM class, tutor students two hours per week, and communicate with the instructor about course contents and about issues raised by students during study sessions.

S³ participants will receive \$400 NSF-Oakton STEM Fellowship each semester (including summer) upon completion of program requirements. S³ participants who are taking a higher level course of STEM, or EGL101/EGL102, may be eligible to join SEP or SMP, and they may receive another \$400 NSF-Oakton STEM Fellowship in a semester that they are participating in SEP or SMP.

For more information about S³, contact Gloria Liu at glorial@oakton.edu or 847-635-1738.

Participants must be a U.S. citizen or a permanent resident to qualify.

**The qualified courses for S³ participants are MAT149, MAT250 or higher, CHM121 or higher, PHY221 or higher.*

Director:

Tingxiu Wang,
tingxiu@oakton.edu,
847-635-1751

Co-Directors:

Joe Kotowski, koto@oakton.edu, 847-635-1861
Gloria Liu, glorial@oakton.edu, 847-635-1738
Bob Sompolski, somplski@oakton.edu, 874-635-1690