

Supported through National Science Foundation (#1304405)

The National Science Foundation STEM Guitar Project provides innovative professional development to faculty instructing from middle school to college; we focus our efforts at the high school and community college levels.

Faculty will take part in an intense five day guitar design/build project. Each faculty member will build his/her own custom electric guitar and will engage in student centered learning activities that relate the guitar design to specific math, science and engineering topics that are linked to national / state standards.

Participants will leave this weeklong experience with their custom-made guitars, curriculum modules with online short term assessments that can be immediately integrated into the faculty's curriculum, and much more. This is an NSF funded institute with a value well over \$2000 per person. For full compensation/ institute fellowship value visit our application pages.

A Sample schedule and videos about past institutes are available under the teacher page @ guitarbuilding.org

## How to apply? (Apply online @ guitarbuilding.org)

The institute application process is open to all STEM educators primarily focused in the 9-12 High school grade level, community college and freshman / sophomore university instruction, however we have also supported some middle school faculty applications.

The application deadline for Summer 2017 Guitar Building Institutes has passed, however, be sure to check back for 2018 institute dates and locations. Past institutes include:



Mesa Community College Mesa, AZ March 14-18, 2016



Kennesaw State University Marietta, GA June 27-July 1, 2016



Kankakee Community College

Kankakee Community College Kankakee, IL July 25-29, 2016



Texas A&M University College Station, TX June 6-10, 2016



Pennsbury High School Fairless, PA June 27-July 1, 2016



Edmonds Community College Edmonds, WA TBD, 2016



Thomas Nelson Community College Hampton, VA June 20 – 24, 2016



Central Oregon Community College Bend, OR July 11-15, 2016



El Paso Community College El Paso, TX TBD, 2016



Institute Details for Teachers

- Typical workshop sessions include the following: STEM Learning Activities in the following disciplines: Physical Sciences, Math, Engineering, and applied Technology topics (CAD, CAM, manufacturing, Reverse Engineering etc.)
- x Lab time for practical application:
- X Next gen and common core tagged projects
- x Online evaluation tools for your classroom
- X Lunch and Learns
- X Guitar Body, neck, fret board selection and assembly
- X Custom headstock design
- X Fretting and setup and intonation of instrument
- X Electronics installation
- X Neck Installation and setup
- x Project implementation discussions
- X Rock Star Friday!





APPLY ON LINE AT Guitarbuilding.org Further Information and Questions? Email: thomas.singer@sinclair.edu