

## Kill LON-CAPA (Next Generation Online Learning)

### Client

David Flammer, Department of Physics (CSM), [pflammer@mines.edu](mailto:pflammer@mines.edu)

### Background

Online learning platforms can be really useful. The strength of LON-CAPA is in its ability to write and deploy versatile learning materials (teachers love that). Its weakness: it's old and slow (students and teachers hate that). Let's help future students and build something better.

### Project Goals and Requirements:

We want to build an online learning platform that takes the strengths of LON-CAPA and brings it into the 21<sup>st</sup> century using HTML5 and Javascript. We already have a number of the pieces in place and are using them for grade entering and analysis in PHGN100 and PHGN200. We want to build a user interface that is customizable by students so you make your learning environment fit your needs. You will be working with a mature Javascript framework, HTML5 charting tools for visualization, and database/server communication. We also deploy mobile friendly versions (extremely important these days), which work on any mobile device in the browser or as an app in the app store. You will learn just about everything that goes into developing a modern web application and HTML5 mobile apps.

### Paid internships are available after Field Session for continuing this work.

### Skills/Experience for CSM Students:

- Javascript/AJAX
- HTML5/SVG
- Cross-platform mobile apps
- MVC Frameworks
- Perl
- MySQL

