

Scratch@MIT 2014 Session Proposal

Accepted for Scratch@MIT 2014, August 6-9, 2014, Cambridge, Massachusetts

Session Title: **Scratch Projects to Enhance for Middle School Music**

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Session Type:

- Poster/Demonstration
- Hands-On Workshop
- Interactive Panel
- Ignite Talk

SESSION DESCRIPTION (400-800 words)

We propose a hands-on workshop geared specifically to middle school teachers on ways to infuse computing into the music curriculum. We are targeting middle schools because while the arts seem to be victims of budget cuts at the high school level, most states still require all middle school students to take courses in the arts, which of course includes music. As a result, middle school music teachers come into contact with a large percentage of the students in their schools. An interdisciplinary approach in which the arts are integrated with STEM — into what has been called STEAM — could therefore include virtually every student in a middle school, having a huge impact on the program's reach and effectiveness within an entire school.

This work has grown out of our NSF-funded Performamatics project, through which we have developed numerous resources, models, and tools that integrate computing and music. We will involve workshop participants by having them actually do one or two of the activities that we have used successfully with middle school students. We will then lead a discussion of the barriers to implementation of interdisciplinary teaching in middle schools and possible ways to address those. Unlike our previous presentations at Scratch@MIT conferences, we will do less presenting and demonstrating and more hands-on activities and interactive follow-up discussions. Like our previous presentations, however, we will prepare a handout of resources for teachers to take away.