

Improve a Vector-Based Image Editor for Scratch (Actionscript 3)

Job Description

We are looking for an experienced programmer to work on a vector-based image editor module written in Actionscript 3. The job will include changing the user interface, adding additional features, and improving the ability to import SVG files, as well as increasing the overall quality and maintainability of the code.

The image editor module is part of Scratch 2.0, a new, cloud-based version of Scratch to be released later this year. Scratch is a free programming tool for young people from MIT (<http://scratch.mit.edu>). Scratch is used by children as young as six, so the image editor must be simple, intuitive, and easy to use.

Essential Skills

- at least one year programming in Actionscript 3
- fluency with the Flash Display, Event system and related API's
- knowledge of vector graphics (e.g. Bezier curves, transforms, gradient fills)
- ability to write clear, well-structured, production-quality code
- good communication skills

Desirable, but Non-Essential Skills

- experience using a vector graphics editor (e.g. Inkscape or Adobe Illustrator)
- familiarity with SVG 1.1

Process and Deliverable

We have a working prototype of the image editor, but portions of the code need to be re-factored to support new features and to make it more robust and maintainable. I expect to refine the user interface of the editor based on user testing, so I'm looking for someone comfortable with an iterative design process.

The deliverable is the Actionscript 3 code for the improved image editor. There are more than a million users of the Scratch website, so high-quality, reliable code is essential.

How to Apply

If you are interested, please respond to scratch-jobs@media.mit.edu with a CV and cover letter highlighting your background and relevant experience, plus a sample of your Actionscript 3 code (to give a sense of your coding style). We will ask you to complete a small test job before proceeding with the full contract.