Electronic Seminar on Mathematics Education

Creating accessible materials

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Creating accessible materials (handouts, exams, lecture notes, and textbooks) can be a challenge in the best of circumstances, but is even more so when they contain mathematics. Paradoxically, documents in electronic forms are often done poorly, when they are really the easiest to get right. Our experience with this topic comes solely from the design and implementation of PreTeXt, which is a markup language and publishing system which converts a single source document into a variety of output formats: print, PDF, HTML, EPUB, Jupyter notebooks, and braille. Since PreTeXt

rigorously separates content from presentation, it is possible to manufacture outputs that are as accessible as the output format permits.

Versions of the slides for this presentation are available in braille (BRF format) by request in advance via an email to <u>beezer@ups.edu</u>. Please specify if you plan to emboss them, or use with a one-line display. Versions of the slides for use with a screen reader will also be posted in advance.

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Zoom link: <u>https://cornell.zoom.us/j/92078267146</u>, passcode esme

For more information on ESME: <u>http://math.mit.edu/seminars/esme/</u>