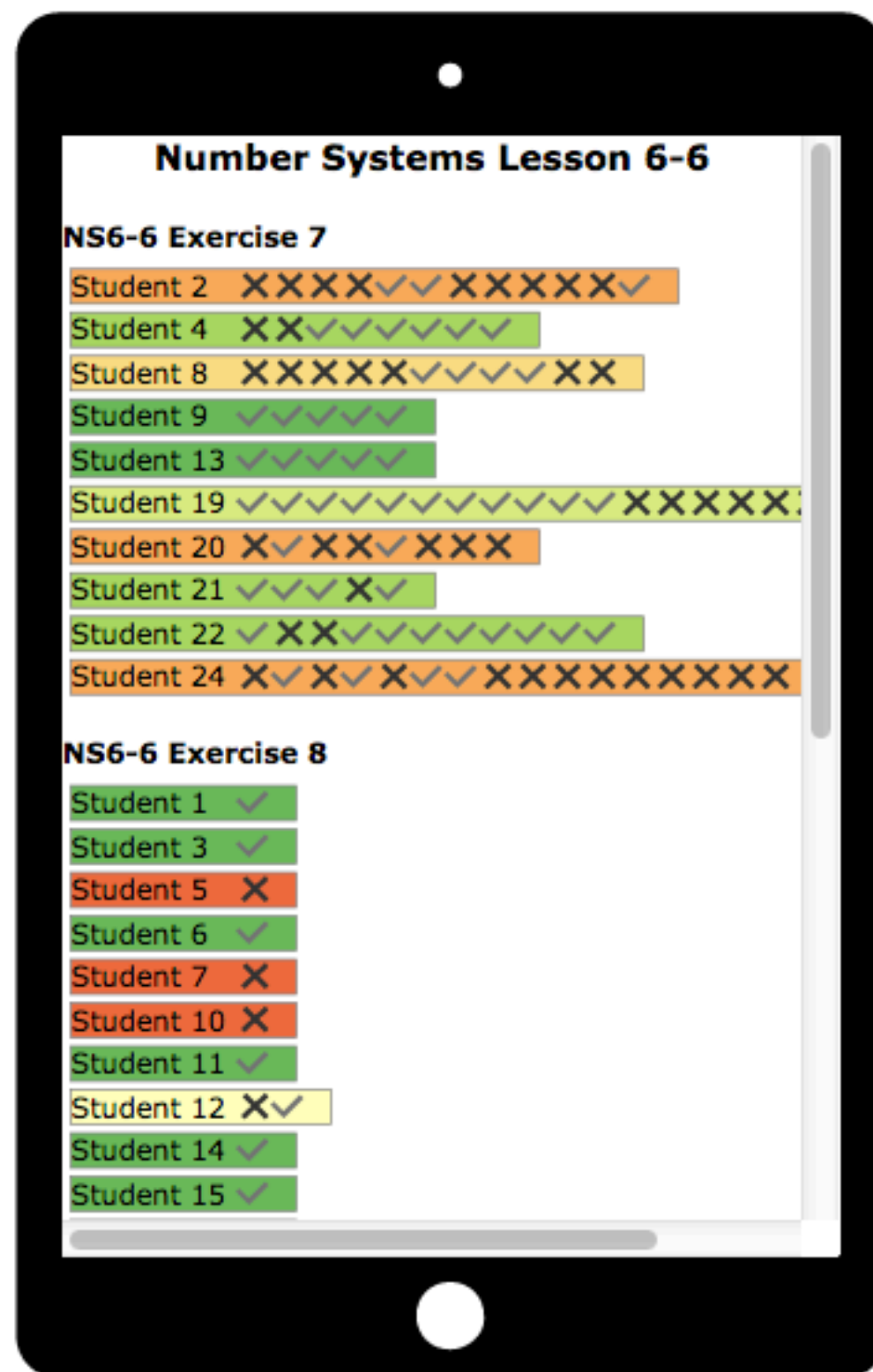


Visualizing Student Problem Solving in Real Time



Concept Visualization

This visualization is designed to provide teachers with information to help them determine which students need assistance in the present moment. In the Enlearn adaptive curriculum, students work through multiple practice problems for each problem type until they have mastered the concept. This visualization displays problem-solving information for the concept that each student is currently working on. The check marks indicate correct responses and the X marks indicate incorrect responses. Teachers can rapidly determine which students are struggling by looking at the bar color, and know which material they need help with by looking at the concept label.

In addition to this concept-based visualization, we also created an aggregate visualization that shows student problem-solving data over the course of the class period. Click the button below to see the aggregate view:

Switch View

This visualization shows data from 6th grade students during a single class period. To view data from a different class period, select the desired session below:

Class Session 1

We chose to use a green-red scale to encode problem correctness, since these colors are so commonly used in educational settings. To provide support for colorblind users, we also support a blue-red scale. Click the button below to change the color mode:

Switch Colors

For more information about our visualizations, contact Yvonne Chen at [evechen\[at\]cs.washington.edu](mailto:evechen[at]cs.washington.edu) and Nell O'Rourke at [eorourke\[at\]cs.washington.edu](mailto:eorourke[at]cs.washington.edu)