

Digital Instruction

In addition to the hard copy materials found in the Teacher Resource Books (TRB), “enhanced” instruction can be delivered via PowerPoint.

Each PowerPoint includes the Introduction and Key Concepts from the sub-lesson, as well as Guided Practice. Two of the guided practice examples from the hard copy are included, enhanced with interactive applets that illuminate and illustrate key concepts.

You can view these PowerPoint sets in preparation for teaching a class, display them during instruction, post them on websites or blogs as a resource for parents and students at home, or assign them to help students catch up after an absence.

The visual components used to illustrate the guided practice examples include animated tables or graphs and applets (i.e., interactive models created with GeoGebra). An Internet connection will be needed to access most of these visual components. In these cases, the PowerPoint slide will display a green “play” button; clicking it will connect to your browser and subsequently to the visual model.

Please adjust your view to maximize the image. You will note that each applet illustrates the specific problem addressed in the guided practice example. The applets allow you to walk through the solution process by visually demonstrating the steps, such as defining points and drawing lines. Variable components of the applets (usually fill-in boxes or sliders) allow you to substitute different values in order to explore the mathematics. For example, “What happens to the line when we increase the amount of time?” or “What if we cut the number of students in half?” This experimentation and discussion supports development of conceptual understanding.

Finally, a slide describing the Common Errors and Misconceptions for the particular lesson is also included. This information will alert you and your students to the difficulties most often associated with the mathematics in the lesson.

GeoGebra for PC/MAC

GeoGebra is not required for using the applets in the Enhanced Instruction PowerPoint, but can be downloaded for free for further exploration at the following link:

<http://www.geogebra.org/cms/en/download>