

THE ELEPHANT PROJECT USER'S GUIDE

PLANNING

Think of the Elephant Project as a sort of “travel guide.” If you have an extended period of time for your students to work through the Elephant Project, you can have your students do all or many of the activities (internet research and bioethics, for example) that are available, or you may just touch on what you feel to be the most relevant points for your students. Also, the Elephant Project can fit into many aspects of general curriculum. Some teachers use the Elephant Project as a means of teaching conservation biology and biodiversity, others use it in conjunction with their genetics unit, whereas others use it when teaching about biotechnology. The Project can also be integrated with social studies or geography to coincide with a time that students are learning about Africa or world events.

To give you some specific details about how the Elephant Project has been incorporated into the classroom, each member of the Elephant Project curriculum development team has included his or her own personal “itinerary” for their class’s journey through the Elephant Project (see Appendix 1). These itineraries include pertinent information such as what grade level and class the project is being used with, length of class period, total time the Project is given, and context in which the Project is taught.

ESSENTIALS

The Elephant Project is laid in sections comprised of activities. **Essential** pages are designated by a border on the right hand margin, same as on this page. These pages are essential for the teacher, who can then decide which are appropriate/essential for the students. Some activities have alternate versions that may be used (no page border). Two examples are the paper RFLP and the option to use semi-log plotting Vs size estimation to determine the RFLP DNA band sizes.

TEACHER GUIDES AND STUDENT HANDOUTS

Certain activities have designated Teacher Guides. These will have the name of the activity followed by “Teacher Guide.” In the Elephant Project notebook supplied by SEP with the Elephant Trunk, Teacher Guides are always printed on yellow paper. Supplementary information and all student materials are printed on white paper (to facilitate photocopying).

ELECTRONIC COPY

An electronic copy of The Elephant Project is also available in the Elephant Project notebook on a CD. Traditionally SEP has made all of our labs available as Microsoft Word documents. However, due to the size and complexity of the Elephant Project we have found it necessary to make it available as a PDF file. For those of you who don’t have Adobe Acrobat Reader, that program is included on the CD. The Elephant Project is not currently available on the SEP website for download.

SIMULATION

Finally, please keep in mind that the RFLP lab is a simulation and SEP is not supplying actual elephant DNA. The DNA in the lab is lambda DNA, same as that used in SEP DNA labs 1 and 2. Some teachers prefer to tell students that this lab is a simulation up front, explaining the logistical issues (obtaining and transporting elephant DNA from Africa to the US) behind using actual Elephant DNA. Other teachers don’t tell the students that the lab is a simulation until the end. They feel that this is more engaging for the students. What you choose to do with your class is entirely up to you (although students should be told at some point in time that this is a simulation).

