

SE/ComS 319: Software Construction and User Interface (Exercise 5)
10/5/2012

This exercise is prepared to introduce you to JTree component. The submission requirement is as follows: Write your name on top of the java file that you will submit as part of this exercise; submit the file via Blackboard by 11:59PM, 10/08/2012.

- Learning outcomes

JTree creation

“The idea of the Erdos number was created by friends as a humorous tribute to the enormous output of Erdos, one of the most prolific modern writers of mathematical papers, and has become well known in scientific circles as a tongue-in-cheek measurement of mathematical prominence. Paul Erdos was an influential and itinerant mathematician, who spent a large portion of his later life living out of a suitcase and writing papers with those of his colleagues willing to give him room and board. He published more papers during his life (at least 1,525) than any other mathematician in history.” – Wikipedia

Erdos' Erdos number is 0. Erdos' coauthors have Erdos number 1. People other than Erdos who have written a joint paper with someone with Erdos number 1 but not with Erdos have Erdos number 2, and so on. If there is no chain of coauthorships connecting someone with Erdos, then that person's Erdos number is said to be infinite.

You are given two java files for this exercise assignment. You are required to update and submit SimpleTreeEx.java.

Review the code SimpleTreeEx.java and ErdosStruct.java. ErdosStruct.java holds data over a set of entities of type AuthNode, represents an author (of type AuthNode) of some technical paper. An AuthNode may contain a set of co-authors (of type AuthNode). The relationship between AuthNode(s) forms a directed acyclic graph.

Implement the constructor of ErdosStructPanel

as specified (such that the data described above is presented in the form of a tree of AuthNode, where the root of the tree is the AuthNode corresponding to Paul Erdos, and the children of a node n in the tree corresponds to coauthors of the author captured in n). In fully expanded form, the view of the tree for the given ErdosStruct.java will be as shown in the figure.

Comment on how the toString method in AuthNode can be used in the UI. Write your comment at the top of the java file as java comments `/*...*/`.

