1023-H1-1437      **Gregory S. Warrington\*** (`warrings@wfu.edu`), Department of Mathematics, Wake Forest University, PO Box 7388, Winston-Salem, NC 27109. *Graphs and juggling.*

Many juggling patterns can be encoded as closed walks in certain families of directed graphs. This correspondence illustrates fundamental notions in discrete mathematics. We describe how these ideas can be incorporated into a discrete math course. This juggling framework can even serve to introduce more advanced material such as Markov chains. Non-jugglers can utilize one of the freely available juggling simulation programs to help demonstrate the ideas.

There will be a short juggling demonstration during the talk. (Received September 26, 2006)