Yiu Tung Poon* (ytpoon@iastate.edu), Department of Mathematics, Iowa State University, Ames, IA 50011, and Jasang Yoon (jyoon@iastate.edu), Department of Mathematics, Iowa State University, Ames, IA 50011. Shift operator with two equal weights. Preliminary report.

We study hyponormal shift operator whose first two weights are equal. We discuss some results on the quadratically hyponormal completion problem and give an example of a quadratically hyponormal shift operator which is not positively quadratically hyponormal. (Received August 19, 2005)