1027-20-226 **Thomas W. Tucker*** (ttucker@mail.colgate.edu), Math Department, Colgate University, Hamilton, NY 13346, and **Marston Conder** (m.conder@auckland.ac.nz). *Gap-filling for the Symmetric Genus of a Group.*

The *symmetric genus* of a finite group A is the smallest g such A acts faithfully as a group of automorphisms of a surface of genus g; if the action is required to preserve orientation, one gets the *strong symmetric genus*. May and Zimmerman (2002) showed that for every g, there is a group of strong symmetric genus g, that is there are no gaps for the strong symmetric genus. In this talk, we show that the only possible gaps for the symmetric genus are $g \equiv 2, 8, 14 \bmod (18)$, by constructing various families of groups that together fill in all the other genera. (Received February 27, 2007)