

1120-47-130

Sivaram K Narayan* (sivaram.narayan@cmich.edu), Department of Mathematics, Central Michigan University, Mount Pleasant, MI 48859, and **Daniel Sievewright** and **Derek Thompson**. *Complex symmetric composition operators on H^2* .

We say that a bounded operator T on a complex Hilbert space H is *complex symmetric* if there exists a *conjugation* (i.e., a conjugate linear, isometric involution) J such that $T = JT^*J$. In this talk, we will discuss the complex symmetry of composition operators $C_\varphi f = f \circ \varphi$ induced on the Hardy space H^2 by analytic self-maps φ of the open unit disk \mathbb{D} . We show that there are complex symmetric composition operators on H^2 induced by φ that are linear-fractional but not automorphisms. In doing so, we answer a recent question of Noor, and partially answer the original problem posed by Garcia and Hammond. (Received February 18, 2016)