1112-05-349 **Wen Liu*** (lwen@math.wisc.edu), 202 Eagle Heights, Apt. K, Madison, WI 53705. *The Incidence Algebra of the Attenuated Space Poset.*

In this talk, we consider the incidence algebra T of the poset P based on the attenuated space $\mathcal{A}_{q^2}(N, M)$. We display some relations among the raising matrix R, the lowering matrix L, and a certain diagonal matrix K. Using these relations we obtain a $U_q(sl_2)$-module structure on $\mathbb{C}P$. We find two central elements of T, and show that these elements generate the center $Z(T)$. We discuss the combinatorial meaning of these central elements.

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