

## Logic Seminar

### *The decomposability conjecture*

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**Abstract:** We characterize which Borel functions are decomposable into a countable union of functions which are piecewise continuous on  $\Pi_n^0$  domains, assuming projective determinacy. One ingredient of our proof is a new characterization of what Borel sets are  $\Sigma_n^0$  complete. Another important ingredient is a theorem of Harrington that there is no projective sequence of length  $\omega_1$  of distinct Borel sets of bounded rank, assuming projective determinacy. This is joint work with Adam Day.

Tuesday, April 13 at 4:00 PM in Zoom