The Tukey order on ultrafilters over uncountable cardinals.

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The Tukey order compares cofinal types of partially ordered sets and has been studied intensively when restricted to the posets $(U, \supseteq)$, where U is an ultrafilter over ω. A parallel research has developed over ultrafilters on uncountable cardinals, and in particular on measurable cardinals. The most recent part of that research is the study of Galvin's property which gained renewed interest due to many applications in infinite combinatorics, cardinal arithmetics, inn er models and forcing theory. In this project we connect the two theories, allowing the flow of results from the countable to the uncountable and vice versa. Surprisingly, the situation for ultrafilters on uncountable cardinals is different for ω, and it turns out that the structure of the Tukey classes is sensitive to different large cardinal hypothesis. This is a joint and ongoing project with Natasha Dobrinen.
(joint work with Natasha Dobrinen)