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Pooja Agarwal, Mackenzie Simper* (msimper@stanford.edu) and **Rick Durrett**. *The q -voter model on the torus.*

In the usual voter model, each vertex on a graph has opinion 0 or 1. A vertex changes its opinion at rate u , where u is the fraction of neighbors with opposite opinion. In the q -voter model, a vertex changes its opinion at rate u^q . Mean-field calculations suggest that there should be coexistence between opinions if $q < 1$, and clustering if $q > 1$. We use the machinery of voter model perturbations to show that the conjectured behavior holds for q close to 1 on the three-dimensional torus. (Received September 16, 2019)