1116-14-293 **Cameron Farnsworth\*** (`cfarnsworth@math.tamu.edu`). *Secants of the Veronese and the Determinant.*

Let $\det_n \in S^n(\mathbb{C}^{n^2})$ be the homogeneous polynomial obtained by taking the determinant of an $n \times n$ matrix of indeterminates. In this presentation linear maps called Young flattenings will be defined. It will then be shown how these maps may be used to demonstrate new lower bounds on the symmetric border rank of $\det_n$. (Received August 24, 2015)