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*The bipartite  $K_{2,2}$ -free process and bipartite Ramsey numbers.*

The smallest  $n$  such that every red-blue edge-coloring of  $K_{n,n}$  contains a blue  $K_{2,2}$  or a red  $K_{t,t}$  is known as the two color bipartite Ramsey number,  $br(2, t)$ . In the bipartite  $K_{2,2}$ -free process, beginning with an empty graph on vertex set  $A \cup B$  where  $|A| = |B| = n$ , random edges from  $A$  to  $B$  are sequentially added under the restriction that no  $K_{2,2}$  is formed. We use the technique of dynamic concentration to analyze this process and show how the resulting graph improves the previously best known lower bound by Caro and Rousseau on  $br(2, t)$  for large  $t$ . This is joint work with Deepak Bal. (Received February 13, 2018)