## Code Tricks for RecSA

## February 21, 2017

- 1. We introduce  $mini\_factor$  to every partition-related calculuation for avoiding dividing zero.
- 2. For numeric stabilization, we smooth the  $\omega_u$  and  $\omega_t$  in Gibbs distribution with bias as

$$\mathcal{P}(r|u,t) \propto e^{\hat{p}(\omega_u + bias)(\omega_t + bias)}$$