

Theory of Computation

Homework 4

Due: 2012/12/11

Problem 1 Show that BPP is closed under reductions. (For simplicity, we assume a reduction runs in polynomial time instead of log space.)

Problem 2 Show that RP is closed under intersection. (This means that $L_1 \cap L_2 \in \text{RP}$ if $L_1 \in \text{RP}$ and $L_2 \in \text{RP}$.)