

Sheet3

Solve Recurrence Relation Using Master Method

a) $T(n) = 2T(n/2) + n \log n$

b) $T(n) = T(2n/3) + 1$

c) $T(n) = 2T(n/2) + n^3$

d) $T(n) = 3T(n/3) + \sqrt{n}$

Solve Recurrence Relation Using Recursion Tree Method

a) $T(n) = 3T(n/3) + n^2$

b) $T(n) = T(n-1) + T(n-2)$

c) $T(n) = 2T(n/2) + 10$

d) $T(n) = 3T(n/3) + n^2$

Solve Recurrence Relation Using Iteration/Substitution Method

a) $T(n) = 2T(n/2) + n$

b) $T(n) = T(n-1) + 1$

c) $T(n) = 2T(n/4) + \sqrt{n}$
