

(a) The running time of the algorithm is

$\Theta(\text{INSERT RUNNING TIME HERE})$

because INSERT EXPLANATION HERE

(b) EXPLAIN YOUR ALGORITHM

ANALYZE ITS RUNNING TIME

(c) EXPLAIN YOUR ALGORITHM (and analyze its running time) OR EXPLAIN WHY YOU CAN'T DO BETTER

- (a) DESCRIBE IMPLEMENTATION OF PARENT
- (b) DESCRIBE IMPLEMENTATION OF CHILD
- (c) HEIGHT OF HEAP
- (d) ASYMPTOTIC RUNNING TIMES OF INSERT AND HEAPIFY
EXPLAIN WHY
- (e) NEW HEIGHT OF HEAP
- (f) NEW RUNNING TIMES OF INSERT AND HEAPIFY
EXPLAIN WHY