1. Given the following array, treat it as a complete binary tree. Show the tree.
   80, 20, 90, 30, 50, 35.

2. When running buildheap, what element do we start with? Why?

3. Show the heap after running buildheap to create a maxheap. Show each step.

4. Run the build in place heapsort, showing the array after each delete.
5. Given the following array, treat it as a complete binary tree. Show the tree.
   70, 50, 40, 20, 30, 60, 10

6. When running buildheap, what element do we start with? Why?

7. Show the heap after running buildheap to create a maxheap. Show each step.

8. Run the build in place heapsort, showing the array after each delete.