1. Estimating g(x) Given f(x)
   1. n
   2. n^2 (Since n^2 > log(n))
   3. n^5
   4. n^3
   5. (n^2)log(n)
   6. nlog(n)
2. Counting Operations to Produce Polynomials
   1. 1
   2. N^2
   3. 3N^2
   4. Log(n)
   5. (n-2)
3. More Advanced Practice
   1. O(log(n))
      1. Binary search utilization the information of the array already being sorted. By constantly cutting its search parameters in half, it limits the amount of interactions that can happen. There are log(2n) steps in binary search. This simplifies to log(n).
   2. O(n^2)
      1. In the worst case scenario (sorted perfectly in the opposite direction the sort is trying to perform), the sort will have to run through it’s entire array, minus 1, every time.