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Problem Set 3: Purely Functional Data Structures

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Choose 2 of the following:

1. Write a function `drop :: Int -> RList a -> RList a` that deletes the first n elements for a binary random-access list. Your function should run in $O(logn)$ time. (From *Purely Functional Data Structures* by Chris Okasaki, 1998.)

2. Reimplement binary random-access lists using a sparse representation such as:

   ```
   data Tree a = Leaf a | Node Int (Tree a) (Tree a)
   type RList a = [Tree a]
   ```

   (From *Purely Functional Data Structures* by Chris Okasaki, 1998.)

3. Implement `drop` as specified above for *skew* binary random-access lists.