1. **Suffix Trees**
   Given a suffix tree representing some text $T$, find the most commonly occurring substring of length $l$ in $T$. For example, if $T$ is 10010010 and $l = 5$ the algorithm should return 10010. If the suffix tree is given in advance the algorithm should take $O(n)$ time worst case where $|T| = n$.

2. **Huffman Encoding**
   Consider the string $s = $ CELESTEELA.

   (a) Show a Huffman encoding trie for $s$.

   (b) Why is the following NOT a Huffman encoding trie for $s$?
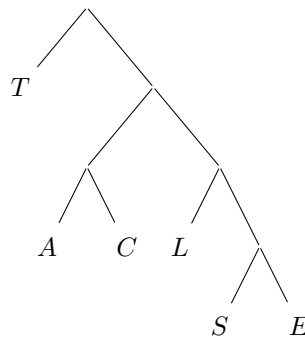


3. **Burrows-Wheeler**

   a) Encode the following string using BWT: MISSISSIPPI

   b) Decode the following string using the inverse BWT: AIMOEOOPN$TOA