Assignment 6

1	*24 points*

Using our final set of phrase-structure rules, provide the syntactic trees for each of the following sentences.

a) The man with the red hat loves almonds.

b) The tall man with the red hat and the black coat loves almonds.

c) The green bug and the tall ant found a piece of food that they could carry.

d) The big house at the end of the street is crumbling to the ground.

As we discussed in lecture, a syntactic derivation can be modelled as a sequence of rewrite steps, as illustrated below:

(1) S   *by S → DP (Aux) VP*
     DP VP   *by DP → (D) NP*
     NP VP   *by NP → N*
     N VP   *by the lexicon*
     Dorothy VP   *by VP → V (DP) (CP)*
     Dorothy V   *by the lexicon*
     Dorothy sleeps

Please show the syntactic derivation of the sentence in (2) as a sequence of rewrite steps. Indicate the phrase-structure rule or "by the lexicon" used at each step. Whenever there is a "choice" in the derivation about which symbol to rewrite, rewrite the leftmost (nonterminal) symbol; that is, do a leftmost derivation.

(2) Lila and Sara made a sandcastle.