Linguistics 201 – Fall 2006, Section F
December 11

Homework Assignment X (optional – can replace a low previous homework score)
Due: Monday, December 18, 2006 (together with the final)

Note:
This is something that we have actually gone through in a very similar form in class. The task of this assignment is to simply recreate this argument step by step.
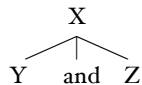
Adding co-ordination to miniEnglish

So far we have no way of accounting for coordinated phrases. Coordinated phrases are phrases that contain a coordination like *and* or *or*. Your task on this homework assignment is to find out what the restrictions on co-ordination in English are, that is what things can or cannot be coordinated, and to mimic those restrictions in our miniEnglish grammar.

Starting point

Consider the following data

a. Elephants chased the cat and the dog.
b. Some cats and some dogs sleep.

Let us assume that coordinated phrases will have three daughters – the two constituents that get coordinated and the coordination (*and* or *or*) in the middle, that means they will look like this:

```
          X
        / | \
       Y  and  Z
```

First Questions

1. What is the constituent structure of the sentences above, in particular what gets coordinated? In other words, what's Y and what's Z for the sentences above? Do we have for instance

   Elephants chased the cat and the dog

   or rather

   Elephants chased <u>the cat and the dog</u>

2. Look at the sentences again. What seems to be the category of the coordinated phrase, that is how does the whole constituent [$_X$ Y and Z] act? The goal here is to find out which label we should use for X.

3. *Lets add* and *and* or *to our lexicon*:

   Coord → and | or

   Based on what you found out in 1 and 2, add a rule to miniEnglish so that we can account for the coordinated phrases. All you need to do is replace X, Y, Z below with whatever category or categories you found out above.

   X   → Y Coord Z

4. *See how it works*

   Draw a tree for either one of the sentences, with the help of our grammar so far, and the rule for coordination you added in 3.

5. *Extending the analysis*

Coordination is much more general than shown above. Look at the following sentences.

a. Elephants sleep and eat.
b. Elephants sleep and eat apples.
c. Very small and slightly scared elephants sleep.
d. Very small and scared elephants sleep.
e. Most cats and dogs eat apples.
f. Most witty cats and scared dogs sleep.
g. The dog left quietly and quickly.

Notes:

about b.   You can't sleep apples.
about d.   Lets say the elephants are both very small and very scared.
about e.   Focus on the meaning where it's most cats and most dogs. *Most* is a Det.
about f.   Again, look at the meaning about most witty cats and most scared dogs.
about g.   We don't have a rule for structures like g in miniEnglish (unless you added one in the last homework). g should be illustrative nevertheless.

Describe, as precisely as possible, what you can coordinate in English, as shown by the examples above.

To do so, say what types of phrases are coordinated in each case, and what the category of the whole coordinated phrase seems to be. Then say what the general pattern seems to be.

Make sure your account also predicts (probably it already does) that we don't get things like

*Quietly and the dog eats an apple.
*The dog sleeps and an apple.

or coordinated structures like

*The dog [[chases the cat] and [the elephant]]

but only the correct

The dog cases [[the cat] and [the elephant]]

For example:

a. Elephants <u>sleep</u> and <u>eat</u>.   Two verbs are conjoined, and they appear in a place where usually a single verb can appear.

6. Can you think of a way to formulate this in miniEnglish without adding a different rule for each category? (Hint: Remember variables?) Try to state it.

7. Can you think of examples where you over- or undergenerate, based on the generalization you ended up with? That is, find examples that are grammatical in English, but don't confirm to the generalization made here.