## CAS LX 522

## Syntax I

Morphosyntactic features, part III
(2.4.2-)

## Pronouns are Ds.

- We'll come back to this again later on, but we will treat pronouns as having category [D], like, say, the or which.
I) We linguists must stick together.


## Pronouns

- Pronouns differ from nouns in a couple of ways (example: case marking), and should be considered a functional category.
- The pronouns of English express person, number, and gender.
- Ist person: I, me, we, us
- 2nd person:you
- 3rd person: he, she, him, her, they, them, it.


## Auxiliaries and modals

- Different from verbs: have, be, do, will, can, might, must, should, could, would, ...
- In questions, auxiliaries "invert" with the subject, verbs don't.
- Will you leave? Can you leave?

Do you leave often?
*Leave you often?

## Auxiliaries and modals

- Auxiliaries occur before not, verbs don't
- You will not leave. You did not leave.
*You left not.
- Notice the extra do-"do-support"
- Auxiliaries are responsible for things like tense, mood, modality, aspect, voice.
- We abbreviate their category as [T] ("tense").


## Infinitival to

I) I like to go to the movies.

- Kind of looks like a preposition, but it's not. Prepositions take nouns, to as a P has a kind of contentful meaning (endpoint of a path). Infinitival to takes (bare) verbs only, means nothing (apart from "untensed").
- It might be more like a modal: To and modals (can, might, should) seem to appear in the same place (between the subject and a bare verb form).


## Infinitival to

I) I like that John can pick up his own drycleaning.
2) I'd like for John to pick up his own drycleaning.

## The P for v. the C for

- For is of course a preposition (I looked for you for three hours), but not when it is introducing clauses.
- He headed right for the back row.
- *He'd like right for the class to be over.
- *He expressed interest in the class to be over.
- Who would you vote for in the election?
- *Who are you anxious for to win the election?


## Regrouping

- Lexical categories:
- $\mathrm{N}:$ noun, V : verb,

A: adjective, P: preposition

- We started a feature decomposition of these by proposing that they are labels for feature bundles like $[ \pm \mathrm{N}, \pm \mathrm{V}$ ], which can characterize certain natural classes across categories.


## Complementizers

1) Pat will leave.
2) I heard that Pat will leave.
3) I wonder if Pat will leave.
4) I am anxious for Pat to leave.

- It is perfectly possible to embed a sentence inside another one. When we do this, it is indicated with a complementizer (introducing a complement clause). Category: [C].


## The $D$ that $v$. the $C$ that

- Same kind of thing holds for that.
I) I liked that movie.

2) I heard that movie involved guinea pigs.

- Sometimes you can replace for clauses with that clauses.
I) It is important that Pat votes.

2) It is important for Pat to vote.

## Regrouping

- But there are many more than four categories.
- Aux: auxiliary, C: complementizer,Adv: adverb, D: determiner, PRN: pronoun, T: modals?, ...
- So, we would need more features to make all of the distinctions. We won't pursue that, however-we'll just use the labels like $\mathrm{N}, \mathrm{V}, \mathrm{A}$, P, D,T, C, etc.)


## Lexical items

- Recall that part of our language knowledge is the knowledge of the lexicon.
- The lexicon is a list of the "words"
- More accurately, it is a list of the things sentences are made of.
- It is traditionally considered to be where "unpredictable" information is stored. The sound, the meaning, the grammatical category, and other features.


## Features of lexical items

- Any given lexical item has:
a. Semantic features
b. Phonological features
c. Syntactic features
- When it comes to syntax, syntactic features certainly matter. But no language seems to arrange its sentences such that words that start with $t$ are first.
- Hypothesis: Syntax can only "see" syntactic features.


## English pronouns

- We could model person with [I], [2], and [3]-except that that predicts eight distinctions, and we have only three.

|  | singular | plural |
| ---: | :---: | :---: |
| first person [1] | I | we |
| second person [2] | you | you |
| third person [3] | he/she/it | they |

## Features of lexical items

- A lexical item is a bundle of properties. It is a meaning, linked with instructions for pronunciation, linked with syntactic properties like category.
- We represent these properties as features.


## English pronouns

- The English pronouns make several distinctions over and above a singular/plural distinction.
- One distinction is person, which is sensitive to who is talking and to whom.
- English (and most languages) distinguish three persons.

|  | singular | plural |
| ---: | :---: | :---: |
| first person | I | we |
| second person | you | you |
| third person | he/she/it | they |

## English pronouns

- Rather, we want to use two features, which only predict four. Slightly better.
- By eliminating [3], we predict a system like that below-as well as a $[1,2]$ combination that is not morphologically distinguished in English.

|  | singular | plural |
| ---: | :---: | :---: |
| first person [1] | I | we |
| second person [2] | you | you |
| third person [3] | he/she/it | they |

## English pronouns

- What about [1,2]? There's no special pronoun form, but what would it mean?
- Well, [I] is the speaker, [2] is the person being spoken to. So [I,2,pl] would be we (including you). Not the same as [l, pl], we (excluding you).

|  | singular | plural |
| ---: | :---: | :---: |
| first person [1] | I | we |
| second person [2] | you | you |
| third person | he/she/it | they |

## Gender

- Many languages distinguish nouns on the basis of "gender" as well.
- English: she/he/it (3rd person pronouns)
- Gender often comes in 2-3 flavors (masculine, feminine, neuter) which often corresponds roughly to biological gender where applicable.


## English pronouns

- Some languages distinguish inclusive and exclusive we morphologically, e.g., Dakota.
- No languages seem to distinguish 8 persons.

|  | singular | plural |
| ---: | :---: | :---: |
| first person [1] | I | we |
| second person [2] | you | you |
| third person | he/she/it | they |

## Phi-features ( $\phi$-features)

- Collectively, person, number, and gender features are referred to as $\phi$-features.
- These are the features that are generally involved in subject-verb agreement.
- We group them together because they seem to have their effects together (that is, not separately).


## Case features

- English pronouns change form also depending on where they are in the sentence.
I) He left. I saw him. He saw me.
- The information about syntactic position is encoded by case features.
- In English, case is only visible on pronouns.
- In many other languages, case is visible on all nouns (and sometimes on words modifying nouns, like adjectives or determiners).


## Case names

- In English, we distinguish nominative (on subjects), genitive (on possessors), and accusative (elsewhere)

| Singular |  |  | Plural |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Nom | Acc | Gen | Nom | Acc | Gen |
| I | me | my | we | us | our |
| you | you | your | you | you | your |
| he | him | his | they | them | their |
| she | her | her | they | them | their |
| it | it | its | they | them | their |

## Features \& pronunciation

- Lexical items are bundles of features. Like [Acc, I, sg, PRN].
- The syntactic system arranges these lexical items into sentences, and then hands the result off to the A-P and C-I systems (at the interfaces)
- At the A-P interface [Acc, I, sg, PRN] is interpreted as "me"

| Singular |  |  | Plural |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Nom | Acc | Gen | Nom | Acc | Gen |
| I | me | my | we | us | our |
| you | you | your | you | you | your |
| he | him | his | they | them | their |
| she | her | her | they | them | their |
| it | it | its | they | them | their |

## Verbal features

- Some features are specific to verbs.
- [past], for example, differentiating write from wrote, kick from kicked. This is a tense feature.
- Some languages have a special form of the verb for the future as well; [future].


## Participles

- English verbs can also take on a participle form: writing, written.
- Not tense, but aspect.
- The -ing form ("present participle") comes after be, indicating a continuing event.
- The -en form ("past participle") comes after have, indicating a completed event.
- Tense can still be expressed—on the auxiliary:I have written, I had written, I am writing, I was writing.


## Features \& pronunciation

- Not every distinction: The structure of the paradigm
- Only 3rd person singular distinguishes gender.
- 2nd person does not distinguish number or between Nom and Acc.
- 3rd person singular feminine doesn't distinguish between Acc and Gen.
can give us clues as to how the interface rules work.

| Singular |  |  | Plural |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Nom | Acc | Gen | Nom | Acc | Gen |
| I | me | my | we | us | our |
| you | you | your | you | you | your |
| he | him | his | they | them | their |
| she | her | her | they | them | their |
| it | it | its | they | them | their |

## Verbal features

- We can characterize present tense as being non-past, non-future.
- In English, future is expressed in other ways, with a modal (will) or with the verb go. English does not seem to make use of the [future] feature; in English there is just past and non-past.
- Cf. duals and the use of [sg] on nouns.


## Participles

- Adger's proposal:
- Present participle: [V, part] (writing)
- Past participle: [V, part, past] (written)
- I distance myself from that because it is not at all clear that the [past] feature in Adger's past participle has anything in common with the [past] feature in an actual past tense.A better name would be, e.g., [perf].


## Bare verb/infinitive

I) I want to win the lottery.

- The bare form of the verb (often appearing after to) is the infinitive.
- We will assign infinitive forms the feature [Inf].
- The fact that the infinitive is a bare verb (no suffixes or other inflection) in English may be something of a coincidence. Other languages mark the infinitive with a special verb form, on a par with participles or tensed verbs.


## Verb agreement

- Verbs very often (across languages) agree with the subject in $\phi$-features as well.
1)I eat bagels.

2) He eats bagels.
3) They eat bagels.

- However, eat isn't really "plural" in any sense. Plurality is a property of the subject, but it is reflected in the morphology of the verb.


## Verb agreement

- In English, only finite verbs show agreement (those that are not infinitives or participles).
- In fact, only present tense verbs do, with the single exception of the copula (be).
- In other languages, agreement sometimes appears on other forms. Participles, for example, sometimes agree with their object. Infinitives very rarely agree with anything.


## Summary:

- Categories: N,V,Adv, A, P, D,T,Aux, C
- Nominal features: case ([nom],[acc], [gen]), $\phi$-features: person ([1],[2]), number ([pl]), gender ([fem])
- Verbal features: tense ([inf],[past]), aspect ([part], [perf])

