Levels of Linguistic Analysis II: Morphology

Alexander Rauhut, M.A.
AG Struktur des heutigen Englisch
Freie Universität Berlin

Winter Semester 2020

Contents

Welcome

Welcome to *Levels of Linguistic Analysis II: Morphology*! On this page, I will condense all presentation materials, summaries of our interactive sessions, and also the weekly homework assignments.

To get started: you can find the syllabus below with everything important accessible via links. Each homework assignment is to be prepared for the following week (#1 for week 2 ...). I also discuss the design of the course under workflow.

You can download this whole document in .pdf or .epub[1] formats. You can also download individual chapters or download this page as html (ctrl+s) and view it in your Browser offline.

Syllabus

This is not the final version!
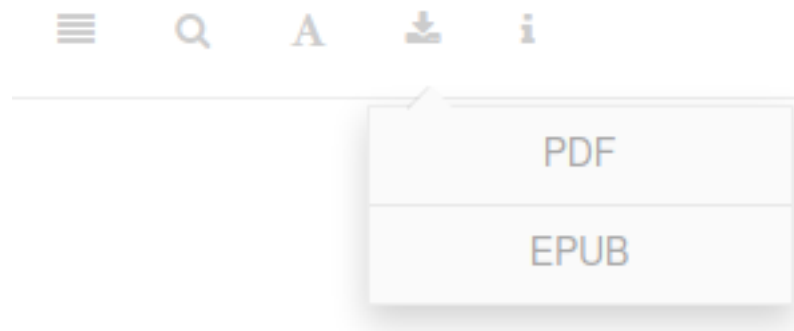
---

[1]Experimental, not perfect but sort of works

Figure 1: Just click on the download symbol in the top left corner.

	Date	Topic	Main Reading	Homework[2]
1	04.11.	Welcome		
2	11.11.	Form and meaning	Stefanowitsch (To appear) ch. 1-2	#2
3	18.11.	Word classes	Stefanowitsch (To appear) ch. 3	#3
4	25.11.	Lexical Relations	Justeson & Katz (1991)	#4
5	02.12.	Collocation	Kennedy (2003)	#5
6	09.12.	Metaphor and metonymy	Deignan (2005)	#6
7	16.12.	Focus I: Derivation	Kaunisto (1999)	#7
8	06.01.	Focus II: Irregular inflection	Anderwald (2011)	#8
9	13.01.	Focus III: Conversion	Deignan (2006)	#9
10	20.01.	Focus IV: Productivity	Plag, Dalton-Puffer & Baayen (1999)	#10
11	27.01.	Focus V: Morphosyntax	Rosenbach (2003)	#11
12	03.02.	Project Day 1	t.b.a.	#12
13	10.02.	Project Day 2	t.b.a.	#13
14	17.02.	Focus VI: Morphophonology	Berg (2000)	#14
15	24.02.	Final Discussion		

Contact

- Alexander Rauhut
- Email: alexander.rauhut@fu-berlin.de
- Homepage: https://alexraw.xyz
- Office Hours (Online): Monday 11-12, or whenever you catch me online.

Links

- Campus Management: Enrolment, Grades
- Primo: FU Online library
- Blackboard: Additional course materials
- StructEng Wiki: A wiki all about (corpus) liguistics written by my colleagues and me. Currently under construction.
- Oxford English Dictionary — Full access via VPN
- Prof. Stefanowitsch's Google Groups
- Tellonym: Anonymous feedback, suggestions, complaints

… to be continued

Course Requirements

- **Enrollment** on Campus Management (CM)
- successfully participated in an **introductory class** to linguistics

A basic grasp of linguistic concepts and a basic knowledge of linguistic terminology is required.

If you cannot successfully join live sessions, contact me and we will find a solution. Also contact me if you cannot participate in the accompanying lecture course.

Weekly workflow

There are three basic components to our seminar:

1. This website
   - Main resource
   - Homework
2. Live sessions
   - Weekly presentations
   - Student presentations
     – Student presentations
3. Self Study
   - Reading assignments
   - Practice

I. This Website   This website is going to be the main hub for information. It will essentially replace most PDF materials you are familiar with from regular semesters, such as presentation slides. You will find all course information, the syllabus, bibliography, and tips and tricks, which you can easily navigate with the sidebar.

All **homework** will be published here. I'd recommend you bookmark the syllabus, because everything that is relevant weekly is linked from there.

The main sections will replace presentation slides. They will be written in the form of short articles that pick up some major points that came up during the live session. They also might go a bit deeper into certain subjects.

My aim is to make the experience as integrated as possible and tell the story of our class in a coherent way throughout the semesters. Inform me about broken or misdirected links. :)

Blackboard   Blackboard is mostly going to be our file storage for sensitive or copyrighted material. Over there, I will upload:

- Readings that are not available through Primo or found online
- Material provided by or including students, e.g. student presentations / posters, recordings

Make sure you have are enrolled in this course. If you are enrolled properly via Campus Management, this should have happened automatically. Feel free to ask me for help if you are having any trouble.

II. Live streams   Every week at the scheduled seminar time—Mondays 16:00-18:00—, I will live-stream my main presentation. For the most part, this will be like our regular seminar, except that we are not all in the same room. Other than that, everyone can ask questions with or without microphone, and it will be as interactive as usual (or even more so).

For now, I am not planning to upload full recordings. I might upload edited pieces from time to time to **Blackboard**. However, I will integrate anything interesting that comes up during the live session into this website. So no one is going to miss out on interesting questions or spontaneous discussions that develop during a live session.

III. Self-study   The bulk of the work, you have to do by yourself. This is nothing special about an online semester. If you look up what an ECTS credit represents you will find that it is work load measured in time. If you then subtract the little time we use during live sessions, you'll realize how much time is left for you to prepare for every week, study the readings, discover your own further readings, do research for your own project, or practice. Ideally you should have read even more than just the recommended literature by the end of the seminar. Reality check if you find yourself skipping entire readings or procrastinating homework assignments.

1   Form and meaning

Main goals of week one is to get comfy with the online format and get to know each other. We also want to refresh our memory about linguistics and get an overview about what is coming in the following weeks. I asked you why you picked morphology and what you expect from the class. We also discussed what questions are driving research in morphology.

1.1   Linguistic questions

Throughout the course, wee are going to discuss various topics mostly from—but not restricted to—the field of morphology, e.g.:

- What makes an **antonym**?
- How do we determine useful **collocations**, **phrases**, **synonyms**?
- How does thinking shape language? How does language shape thinking?
- What is the relationship between meaning and **grammar**?
- How can we be objective about language?

1.2   Questions in morphology

A lot of focus in morphology is on the relationship between form and meaning. The further we go to the grammar side of linguistics, the harder it becomes to use an intuitive concept of meaning as a starting point. It seems rather easy to determine the meaning of the word *cat*. A simple definition usually satisfies. We can characterize *cat* as a word. It is phonologically and morphologically distinct from other words. It is also a morpheme. It can serve as a root for more complex words, such as *cats*. The morpheme is, "the smallest meaningful unit," remember? So, what about the meaning of *-s* in *cats*? If the root morpheme has a meaning, the plural suffix has to has one as well. A straight forward answer would be: plural, more than one. You were introduced to this as "grammatical meaning." Lexical words have lexical meaning, function words and inflectional affixes have grammatical meaning.

Matters still seem simple enough until we enter more complicated territory in English. Consider the *-ed* suffix like in the verb *helped*. Most people would be quick to call that the "past tense" and *-ed* is the past tense ending. What is complicating things now is the fact that *-ed* is also used in present tenses, or passives.

(1) Present perfect: I have watched the show already.
(2) Past perfect: I'd never laughed so hard in my life before that.
(3) Passive: I'm being observed right at this moment.

First, we could assume that there are, in fact, multiple *-ed* endings. In irregular verbs, there is another form, the past participle: *write*, *wrote*, *written*. It would only make sense to assume that there is a *-ed* past form and a *-ed* past participle form. That means we have a kind of homonymy here. One form that has two different meanings. So what is this meaning? Is it "past?" Does the event denoted by the verb happen in the past relative to the time of utterance?

Consider these examples:

(4) Backshifting: Trump has claimed there **was** evidence for fraud.
(5) Unreal Conditional: If I **met** him tomorrow, I would slap him with a fish.
(6) Optative: I wish people **believed** in science.

In neither of these examples does the event occur in the past. Therefore, we have to assume a more abstract function of the past tense suffix *-ed* that allows for all these use cases. More importantly, the surrounding forms, auxiliary verbs (passive *be*, perfect *have*), conjunctions (conditional *if*), and even certain classes of verbs (reporting verbs, such as *claim*). In fact, a linguistic **form** is not restricted to a word or morpheme, but may also include larger structures or even abstract schematic structures. For example, the grammatical function "present perfect" is fulfilled by a wealth of different forms, with optional slots, different possible word orders, etc.

The popular opinion in linguistic theory, especially in Usage-Based Linguistics, has shifted more and more towards seeing meaning and function as two sides of the same coin. Function determines meaning and meaning is in the end a function.

Here are some broader questions that we will encounter during this class:

1. Why do we have multiple functions that seem to be encoded in the same form? (homonymy)
2. Why do we have multiple forms that seem to do the same thing? (synonymy)
3. Is a morpheme even a part of our cognitive reality or can we find better units of description? Are there better models for certain areas of grammar?

1.3 Course Aims

1.3.1 Linguistic and academic skills

The introduction course had the aim to provide you with the necessary **terminology**. Like in learning a language, you need to build up your academic vocabulary before you can productively participate in any discussion. This course now is the next step. We are going to transition from reading text book chapters to actual research literature. We are going to expand the concepts and the theory behind them. And finally we are going to put it to a test by writing a linguistic study.

In the end, you will...

- Have a deeper understanding of basic linguistic concepts
- Have first experience with reading and carrying out **empirical** research
- Understand basic concepts of **cognitive science** and **usage-based** linguistics
- Understand and compile basic **statistics**

1.3.2 Skills that go beyond linguistics

Many of the skills you acquire during this class are not only useful in linguistics. Especially knowledge of empirical methodology and statistics is now more important than ever. Everyone encounters results of empirical research (good and bad) on a daily basis on the news and social media, but too few people can actually interpret the information properly. Many jobs also require at least basic knowledge in statistics.

Furthermore, there are other skills that you may benefit from indirectly, such as...

- Understanding human perception of quantities
- Understanding memory
- Understanding non-linguistic research results better

- Improve writing, reading and computer skills

1.3.3   Soft skills for Teachers

- Understand the logic behind modern teaching material
- Spot bad or obsolete material
- Understand how stubborn mistakes are learned
- Become a more aware of statistics, correlations and spurious correlations in your class room

1.4   Homework

In order for everyone to get used to all necessary channels, I am not providing the readings, but rather make it your first task. Now that you do not have access to the university buildings and the library everyone should learn how to connect via VPN. With a VPN connection, you have access to all online resources provided by our library.

1. Setup a VPN connection to the university network.
   - Setup guide
2. Download the main readings online and download them.

   - Google Scholar (you can search for authors by typing author:*name*)
   - Primo
   - Sometimes papers or entire books are uploaded on the authors own website, so regular search engines help sometimes
3. Make a note for every reading you couldn't find. Some require a bit of digging, but they are all out there.

Having the possibility to connect to the university network via VPN is important even under normal circumstances. Google Scholar provides Primo links as long as you are connected to the university network (via VPN or eduroam). Every main reading can be found online.

1.4.1   Tip

I'm going to share all sorts of productivity tips for the aspiring academic at the end of every homework assignment.

Today's Tip:

Set up **shortcuts to important search engines.**

You will be doing a lot of research on google scholar, wikipedia and so on. Most browsers have some functionality to make it easier for you. Here is my setup: In my address, bar I only type 'sc keyword' or 'w keyword' and my browser searches for 'keyword' automatically on Google scholar or Wikipedia respectively (combine with Ctrl+L for hyperspeed ☺).[3] This works for most websites with a search field.

Here is where you find instructions for some popular browsers.

- For Firefox: Click here
- For Brave: Click here
- For Chrome: Click here

---

[3]*Nachhaltigkeitsbonus*. You bypass your general search engine 🗑.

Appendix

The following sections contain some miscellaneous information in various topics around the course. Though, not strictly necessary to finish the course, some of the articles might be interesting for some of you.

Academic posters

Your poster presentation (information on the presentation day) is essentially a progress report of the project you are working on. Its structure is mostly identical to that of an academic paper. There should be an introduction (usually at the top), and a conclusion (usually at the bottom). You should also reference research literature and include a bibliography.

The main difference is that, if possible, there should be less text and more examples, figures, and tables. Ideally, you have already explored some corpus data and have some preliminary results. Here is a list of elements that could be at the heart of your poster.

Linguistic data:

- Numbered examples that illustrate your phenomenon (ideally from your data set)
- Concordances
- Frequency list
- Tables with counts for individual categories

Visualizations

- Bar charts
- Stacked bar charts
- Pie charts
- Scatter plot …

Conceptual Figures

- Flow charts
- Venn diagrams
- Models

Layout

When it comes to the design of your poster, it is mostly up to your creativity. Posters are usually A0, so quite large. For layouts, just google academic posters or linguistics posters. In academia, your institute or university usually has a corporate design and might even provide templates. Corporate designs include logos, colors, fonts and other instructions of varying specificity (e.g. FU corporate design).

More common layouts include headers and footers. The header includes the title, logo, names of the authors, their affiliations, and contact information. The footer includes references, acknowledgements, footnotes. This provides a frame for the main body, that has numbered sections, just like a paper. Sometimes people include an abstracts at the beginning that is a summary of the project.

I have provided a very simple template on Blackboard for you. Feel free to use it.

Programs

Most commonly, people create their posters in presentation software like Powerpoint / Impress. If you are already familiar with image editing programs like Photoshop or programs for graphical design, these might be an option for you. The most powerful, and extensible options are Latex

or Markdown, which offer great functionality when it comes to references, bibliographies, cross-references, numberings and captions. For a beginner, it might be extremely difficult to work with those tools without mouse drag-and-drop, but you can just download example files from places like Overleaf (e.g. here) and just throw in your contents.[4]

Starting from scratch might be daunting. However, there are countless templates online. Just search for one created with your tool of choice, pick one you like, and modify it if necessary.

Command line tricks

Working through the command line, i.e. working with a text-only interface from a terminal, is a very powerful way to do precise and flexible data manipulation. Unfortunately, the command line has fallen out of use for a wide variety of reasons, non of which having to do with it being in any way inferior or more difficult. As a matter of fact, it is easier to do certain operations, in particular producing automated and reproducible processes, and it is the preferred method for a large group of scientists (not only programmers) and even just regular "power users."

In the following section, I will gather some tricks that make it easier for you to work with command line tools like CQP. A terminal only handles text in- and output so mouse functionality is limited. Some keys and key combinations also migh show unexpected behavior.

1.4.2 The shell

The shell is what is running in your terminal and interprets your commands. It is the counterpart of the background process of Windows, Linux or macOS that draws windows.

1.4.3 Copy & Paste

Depending on your terminal program you might want to try the following things.

- `ctrl + shift + c` (copy) and `ctrl + shift + v` (paste)
- middle mouse button (in Linux and macOS)
- Windows only: right click, (both copy and paste)

`ctrl + c` and `ctrl + v` have different meanings in most terminals. `ctrl + c` e.g. cancels the current process.

1.4.4 Colors

It might sound weird, but the default color scheme in a terminal is probably one of the main reasons people find working in the command line scary. Black on white or white on black (blue for Powershell) are ugly, hurt your eyes, and can make focussing for longer time periods difficult. My suggestion is, therefore, to switch this to a low contrast color scheme. Light gray text on a darker gray background is what I personally can work with best.

- Windows Powershell: right click on the top bar → properties → colors
- Windows Terminal: See here
- Putty: color menu is right on the left on the start screen
- macOS: right click on "Terminal" in the panel → properties →pr

There is a whole parallel universe of people for whom terminal color schemes are an art form (check out this subreddit). Since CQP does not produce colored output (yet), it is unfortunately not too useful for us.

---

[4]I do not recommend making posters or slide presentations in Latex as an absolute beginner. With that said, you can learn a great deal about how styling works if you try. I forced myself to prepare a whole seminar in Latex beamer, and it was a great learning experience. But that was when I was already highly dedicated to switching away from Word and Powerpoint. It can be frustrating and requires patience.

1.4.5 Eastereggs

- Star Wars in the terminal: `telnet towel.blinkenlights.nl`
- Dancing parrot: `curl parrot.live`

References

Anderwald, Lieselotte. 2011. Norm vs variation in British English irregular verbs: The case of past tense *sang* vs *sung*. *English Language & Linguistics*. Cambridge University Press 15(1). 85–112.

Berg, Thomas. 2000. The position of adjectives on the noun–verb continuum. *English Language & Linguistics*. Cambridge University Press 4(2). 269–293.

Deignan, Alice. 2005. A corpus linguistic perspective on the relationship between metonymy and metaphor. *Style* 39(1). 72–91.

Deignan, Alice. 2006. The grammar of linguistic metaphors. In Anatol Stefanowitsch & Stefan Th. Gries (eds.), *Corpus-based approaches to metaphor and metonymy*, 106–122. Mouton de Gruyter.

Justeson, John & Slava M Katz. 1991. Co-occurrences of antonymous adjectives and their contexts. *Computational linguistics*. MIT Press 17(1). 1–19.

Kaunisto, Mark. 1999. Electric/electrical and classic/classical: Variation between the suffixes *-ic* and *-ical*. *English Studies*. Taylor & Francis 80(4). 343–370.

Kennedy, Graeme. 2003. Amplifier collocations in the British National Corpus: Implications for English language teaching. *Tesol Quarterly*. Wiley Online Library 37(3). 467–487.

Plag, Ingo, Christiane Dalton-Puffer & Harald Baayen. 1999. Morphological productivity across speech and writing. *English Language & Linguistics*. Cambridge University Press 3(2). 209–228.

Rosenbach, Anette. 2003. Aspects of iconicity and economy in the choice between the s-genitive and the of-genitive. In Günther Rohdenburg & Britta Mondorf (eds.), *Determinants of grammatical variation in English*, 379–411. Mouton de Gruyter.

Stefanowitsch, Anatol. To appear. *Corpus linguistics: A guide to the methodology*. Draft.