Day 9.2.

Problem: Persian verbs

<table>
<thead>
<tr>
<th>mixaram</th>
<th>I buy</th>
<th>xaridam</th>
<th>I bought</th>
</tr>
</thead>
<tbody>
<tr>
<td>mixari</td>
<td>you (sg.) buy</td>
<td>xaridi</td>
<td>you (sg.) bought</td>
</tr>
<tr>
<td>mixarad</td>
<td>(s)he buys</td>
<td>xarid</td>
<td>(s)he bought</td>
</tr>
<tr>
<td>mixarim</td>
<td>we buy</td>
<td>xaridim</td>
<td>we bought</td>
</tr>
<tr>
<td>mixarid</td>
<td>you (pl.) buy</td>
<td>xaridid</td>
<td>you (pl.) bought</td>
</tr>
<tr>
<td>mixarand</td>
<td>they buy</td>
<td>xaridand</td>
<td>they bought</td>
</tr>
<tr>
<td>residam</td>
<td>I arrived</td>
<td>xabidam</td>
<td>I slept</td>
</tr>
<tr>
<td>resanidam</td>
<td>I sent</td>
<td>xabanidam</td>
<td>I put to sleep</td>
</tr>
</tbody>
</table>

What morphemes mean the following?

-> 'buy'
-> 'sleep'
-> 'arrive'
-> ‘send’

-> 'I'
-> 'you'
-> '(s)he'
-> 'past'
Doing derivations of complex words.

EXAMPLE = *disappearance*

**Step 1** (from last week): isolate smallest free-standing piece which bears part of the meaning of the whole.

Not (for example): *sap* or *pear* -- they are free-standing, but don't bear any part of the meaning of the whole word.

Not (for example): *dis* -- this might bear some part of the meaning of the whole word, but it is not free-standing.

Here: *appear*

**Step 2:** trace a path from the root, through morphological rules, to the final complex word.

Here, we need two things to the form: add *dis-* and add *-ance*

There are two possible paths:

Path 1: *appear -> appearance -> disappearance*

Path 2: *appear -> disappear -> disappearance*

**Step 3:** Check each step in each path. For each arrow in the path, is there any evidence that such a rule exists? Evidence comes in the form of other words participating in the same derivation. (Remember: making a morphological break is really saying something about what other words exist in the language.)

**Checking Path 1:**

Path 1; Rule 1 OK: verb + ance -> a noun meaning the event of the verb

appear -> disappear

clear -> clearance

forbear -> forbearance

Path 1; Rule 2 NOT OK: dis + noun????

appearance -> disappearance

chair -> *dischair*

illuminator -> *disilluminator*

flagellum -> *disflagellum*

**PATH 1 ain't gonna do it.**
Checking Path 2:

Path 2; Rule 1 **OK**: dis + verb -> some negated version of the verb

- appear -> disappear
- engage -> disengage
- approve -> disapprove

Path 2; Rule 2 **OK**: verb + ance -> a noun meaning the event of the verb

- disappear -> disappearance
- conive -> conivance
- clear -> clearance
- forebear -> forebearance

**PATH 2 makes sense.**

**Step 4**: Lay out your derivation in a straight-forward manner. I'd suggest the following:

<table>
<thead>
<tr>
<th>words at each step</th>
<th>category of word</th>
<th>a parallel example</th>
</tr>
</thead>
<tbody>
<tr>
<td>APPEAR</td>
<td>(a verb)</td>
<td></td>
</tr>
<tr>
<td>DISAPPEAR</td>
<td>(another verb)</td>
<td><strong>OK</strong>: ENGAGE -&gt; DISENGAGE (verb -&gt; verb)</td>
</tr>
<tr>
<td>DISAPPEARANCE</td>
<td>(an noun)</td>
<td><strong>OK</strong>: CLEAR -&gt; CLEARANCE (verb -&gt; noun)</td>
</tr>
</tbody>
</table>
General system for multi-step analyses.

1) Parse complete word into as many pieces as you can.
   i. check each piece to make sure that you have other words with parallel meanings that show that you evidence for multiple morphemes
   ii. e.g. ‘understate’ can be parsed into ‘under’ and ‘state’ because we have other words like ‘underestimate’ and ‘restate’ which share form and meaning with each part you cut out.
   iii. e.g. also, ‘understand’ cannot be parsed because other words with ‘under’ and ‘stand’ don’t share meanings with ‘understand’.

2) Find a root, which normally in English is a free-standing morpheme.
   i. e.g. ‘restatement’ has in the middle ‘state’, which stands alone and bears the core meaning found in the whole word.

3) Categorize the root. (More on how to do this next week in class.)
   i. e.g. ‘state’ here could be either a ‘noun’, as in “The state is spending lots of money on tourism ads,” or a ‘verb’, as in “I stated my analysis in various ways.”
   ii. Here, I have to keep track of the different possible root categories. I have two candidate analyses so far, one with a noun root, and one with a verb root.

4) Choose affixes which are closest to the root, and check whether the addition of each of them will produce a form with the right categorization, and other parallel forms.
   i. I have two possibilities here: a) start with re-, or b) start with –ment.
   ii. Possibility a) would take ‘state’ -> ‘restate’. To check this, I need to know of other roots like ‘state’ take the ‘re-’ rule. We have words like ‘re+use’, where the root is a verb, and the combination with ‘re-’ means to ‘verb again’. This is exactly parallel to ‘re+state’, as long as I categorize ‘state’ as a verb.
   iii. Adding ‘re-’ first, I can eliminate ‘state’ as a noun, since we don’t have parallel ‘re+noun’ forms.
   iv. Possibility b) would take ‘state’ -> ‘statement’. To check this, we note other forms like ‘entertain’ -> ‘entertainment’, with exactly the same meaning change. Again, ‘entertain’ here is a verb, so this analysis would have ‘state’ as a verb as well.
   v. Adding ‘-ment’, I also can eliminate ‘state’ as a noun, since nouns don’t take ‘-ment’.

5) Keep all possible analyses which pass these tests.
   i. E.g., with ‘restatement’, I now have two possible analyses, one with ‘re-’ first and one with ‘-ment’ first.

6) Continue until entire word is constructed, checking all possible orders of prefixes and affixes as you go. There may be more than one possible structure for a word, in which case there may be more than one meaning for a word.
   i. To finish off ‘restatement’, I need to check the final steps of the two possible analyses.
   ii. Possibility a) so far has ‘restate’, and now we need to finish off with ‘-ment’.
   iii. ‘restate’ is a verb, and there are other verbs, like ‘entertain’ that take ‘-ment’ to produce nouns. Thus, we are justified in creating the final word, ‘restatement’ by doing ‘re-’ first, and then ‘-ment’ later on.
   iv. Analysis 1 = ‘state’ (verb) -> ‘restate’ (verb + ‘again’) -> ‘restatement (noun version of (verb + ‘again’)).
   v. Possibility b) so far has ‘statement’, and now we need to finish off with ‘re-’.
   vi. ‘statement’ is a noun, and we have problems finding other nouns which take ‘re-’.
   vii. The second analysis (‘state’ (verb) -> ‘statement’ (noun version of verb) -> ‘restatement’ ((noun version of verb) ‘again’) won’t work, because the second step isn’t supported.
   viii. Analysis 1 is right, and there is only one derivation for this word.