## Derivational Paradigm

## Overview

1. What is a 'paradigm'?
2. IA/IP versus WP
3. Predictability from a 'base'
4. Going beyond Inflection
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## What is a 'paradigm'?

- A series of morphologically related forms sharing a base.

Partial paradigm for Latin 2nd conjugation verbs:
Present tense of monēre 'to warn'

| $1^{\text {st }} \mathrm{s}$. monē̄ | $1^{\text {st }} \mathrm{p}$. monēmus |
| :--- | :--- |
| $2^{\text {nd }} \mathrm{s}$. monēs | $2^{\text {nd }}$ p. monētis |
| $3^{\text {rd }}$ s. monet | $3^{\text {rd }}$ p. monent |

All of these particular forms include the portion mone-but the entire paradigm for this verb includes 6 tenses, 2 voices, 3 moods and various participles, infinitivals, and gerund forms as well.

## IA/IP versus WP

- Item \& Arrangement / Item \& Process approach:
- Underlying word segments (morphemes) are crucial
- Whole words are merely the composition of their parts and have no role in forming other words (aside from compounding)
- Fundamental premise: ALL related forms necessarily derive from a single base (any exceptions are ideosyncratic and patterns of exceptions are accidental)

Monere: 'mone’ + -o; -s; -t; -mus; -tis; -nt

## IA/IP versus WP

- Word \& Paradigm approach:
- Whole-word forms are primary together with any patterns of relatedness in which they participate
- Abstracted sub-pieces of words (whether or not morphemes -e.g. linking vowels) are meaningful only to the extent to which they are in paradigmatic opposition (i.e. distinguish (sub)patterns of regularity)
- The possibility of a single base is epiphenomenal and is NOT crucial to word formation
\{monere; moneo; mones; monet; monemus; monetis; monent\}
- All wordforms in this partial paradigm have equal status. The bolded pieces in paradigmatic opposition reveal a sub-pattern involving mone which need NOT be throughout the paradigm


# Predictability from a 'base' 

Formation of Latin perfect and future participles:

| Present Active | Perfect Passive | Future Active | Gloss |
| :---: | :--- | :--- | :--- |
| Infinitive | Participle | Participle |  |
| monē-re | monit- | monit-ūr- | 'warn' |
| duce-re | duct- | duct-ūr- | 'lead' |
| audī-re | audīt- | audīt-ūr- | 'hear' |
| vehe-re | vect- | vect-ūr- | 'carry' |
| haerē-re | haes- | haes-ūr- | 'stick' |
| preme-re | press- | press-ūr- | 'press' |
| fer-re | lat- | lat-ūr- | 'bear' |

(Participles function like adjectives in requiring person/number agreement)

- IA/IP crucially depend on the existence of a single base - all these participles are ideosyncratic and the association between perfect and future accidental
- WP utilizes as a starting premise the paradigmatic contrast between Present Infinitive and Perfect Participle to identify further patterns of relatedness in word formation (e.g. the relationship between perfect and future participles)


## Going beyond Inflection

Dutch toponyms, inhabitant terms and toponymic adjectives:

| Toponym | (unspecified) <br> Inhabitant | Adjective | Female <br> Inhabitant |
| :--- | :--- | :--- | :--- |
| België | Belg | Belg-isch | Belg-isch-e |
| Drente | Drent | Drent-s | Drent-s-e |
| Finland | Fin | Fin-s | Fin-s-e |
| Hongarije | Hongaar | Hongaar-s | Hongaar-s-e |
| Noorwegen | Noor | Noor-s | Noor-s-e |
| Rusland | Rus | Russ-isch | Russ-isch-e |
| Zeeland | Zeeuw | Zeeuw-s | Zeeuw-s-e |

- Like Latin participle formation, word forms related to Dutch toponyms can NOT be predicted from any one single base (all inhabitant and adjective forms are ideosyncratic)
- By utilizing the paradigmatic contrasts between toponym and inhabitant forms further patterns of relatedness are directly incorporated in word formation and NOT accidental


## Further examples

Derivation of French adverbials with -ment:

| a. Masc. Adj. | Fem. Adj. | Adverb | Gloss |
| :---: | :--- | :--- | :--- |
| faux | fausse | faussement | 'falsely' |
| lent | lente | lentement | 'slowly' |
| heureux <br> certain | heureuse <br> certaine | heureusement <br> certainement | 'happily' |
| 'certainly' |  |  |  |

## Further examples

Derivation of diminutives for some Tigre nouns:

| Gloss | Singular | Plural | Diminutive <br> Singular | Diminutive <br> Plural |
| :--- | :--- | :--- | :--- | :--- |
| 'stone' | 'əbən | 'əbbän | 'əbbän-ät | 'əbbän-at |
| 'coffepot' | gəban | gäbän-otat | gäbän-ät | gäbän-etat |
| 'paper' | wəraq | wäräq-otat | wäräq-ät | wäräq-etat |
| 'pot' | säkänab | säkänəb | säkäneb-ät | säkäneb-at |

## Practice dataset: Somali

(the diacritic' indicates a high tone)

| a. înan | 'boy' | inán | 'girl' |
| :---: | :--- | :--- | :--- |
| nácas | 'stupid man' | nacás | 'stupid woman' |
| daméer | 'young male donkey' | dameér | 'young female donkey' |
| darmáan | 'colt' | darmaán | 'filly' |
| qaálin | 'young male camel' | qaalin | 'young female camel' |
| b. kálax | 'ladle' | kaláx | 'ladles' |
| bálli | 'water reservoir' | ballî | 'water reservoirs' |
| túug | 'thief' | tuúg | 'thieves' |
| soomaáli | 'Somali man' | soomaalî | 'Somali people' |

What semantically \& phonologically characterizes the morphological process in this data? Is (a)/(b) derivation of inflection?

## Practice dataset: Tohono O'odham

| Imperfective | Perfective |  |
| :--- | :--- | :--- |
| hi:nk | hi:n | 'to bark' |
| pisalt | pisal | 'to weigh' |
| gatwid | gatwi | 'to shoot' |
| he:edkad | he:edka | 'to smile' |
| cicwi | cicwi | 'to play' |
| wacwi | wacwi | 'to bathe' |

What characterizes the morphological process in this data?

