

# The Nanosyntax of Ukrainian Adjectives and Adverbs

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# Outline

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## Aims of this talk

- ▶ To take a close look at the morphology of Ukrainian adjectives and adverbs

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- ▶ To take a close look at the morphology of Ukrainian adjectives and adverbs
- ▶ To analyse the interaction between the comparative marker and adjectivizing morphology
- ▶ To investigate the internal structure of comparative adjectives and adverbs

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	adjective	translation
a.	vesel- <b>yj</b>	'cheerful'

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	adverb	translation
a.	vesel- <b>o</b>	'cheerfully'

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a.	vesel- <b>yj</b>	'cheerful'
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	adverb	translation
a.	vesel- <b>o</b>	'cheerfully'
b.	dešev- <b>o</b>	'cheaply'

# Introduction

POS adjective	CMPR adjective	translation
a. vesel- <b>yj</b>	vesel- <b>iš</b> - <b>yj</b>	'cheerful'

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POS adjective	CMPR adjective	translation
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b. dešev- <b>yj</b>	dešev- <b>š</b> - <b>yj</b>	'cheap'

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	POS adjective	CMPR adjective	translation
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	POS adverb	CMPR adverb	translation
a.	vesel- <b>o</b>	vesel- <b>iš-e</b>	'cheerfully'

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a.	vesel- <b>o</b>	vesel- <b>iš-e</b>	'cheerfully'
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# Comparative allomorphy

	POS ADJ	CMPR ADJ	translation
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# Comparative allomorphy

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a.	važlyv-yj	važlyv-iš-yj	'important'
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	POS ADV	CMPR ADV	translation
a.	važlyv-o	važlyv-iš-e	'importantly'
b.	dešev-o	dešev-š-e	'cheaply'

# Comparative allomorphy

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a.	važlyv-yj	važlyv- <i>iš</i> -yj	'important'
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	POS ADV	CMPR ADV	translation
a.	važlyv-o	važlyv- <i>iš</i> -e	'importantly'
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- ▶ There are two comparative allomorphs in Ukrainian: *-iš* and *-š* (Vyhnevská 2023).

# Comparative allomorphy

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a.	važlyv-yj	važlyv- <i>iš</i> -yj	'important'
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- ▶ There are two comparative allomorphs in Ukrainian: *-iš* and *-š* (Vyhnevska 2023).
- ▶ The choice between the two is an arbitrary property of the root.

# Slavic comparative suffixes

PS	OCS	Ukrainian	Polish	Czech	Slovak
*-j̃s	-j̃š	-š	-sz	-š	-š
*-ej̃s	-ěj̃š	-iš	-ejsz	-ějš	-ejš

Table 1: Slavic CMPR suffixes

# Two types of comparatives in OCS

Pancheva (2024: 21-22)

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Type 1 comparative:

- ▶ *xoud-a* 'poor' -> *xoužd-**buš**-i* 'poorer'
- ▶ old
- ▶ very frequent adjectives
- ▶ not productive anymore
- ▶ only PC-denoting expressions

# Two types of comparatives in OCS

Pancheva (2024: 21-22)

## Type 1 comparative:

- ▶ *xoud-a* 'poor' -> *xoužd-**bš**-i* 'poorer'
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- ▶ very frequent adjectives
- ▶ not productive anymore
- ▶ only PC-denoting expressions

## Type 2 comparative:

- ▶ *větr-**bn**-a* 'windy' -> *větr-**bn**-**ěiš**-i* 'more windy'
- ▶ new
- ▶ productive
- ▶ non PC-denoting expressions

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# Overview of patterns

## ► Adjectives

POS	CMPR
-AGR	- <b>š</b> -AGR
-AGR	-i <b>š</b> -AGR
-n-AGR	-n-i <b>š</b> -AGR
-k-AGR	-k-i <b>š</b> -AGR
-k-AGR	- <b>š</b> -AGR

# Overview of patterns

## ► Adjectives

POS	CMPR
-AGR	- <b>š</b> -AGR
-AGR	-i <b>š</b> -AGR
-n-AGR	-n-i <b>š</b> -AGR
-k-AGR	-k-i <b>š</b> -AGR
-k-AGR	- <b>š</b> -AGR

## ► Adverbs

POS	CMPR
-ADV	- <b>š</b> -ADV
-ADV	-i <b>š</b> -ADV
-n-ADV	-n-i <b>š</b> -ADV
-k-ADV	-k-i <b>š</b> -ADV
-k-ADV	- <b>š</b> -ADV

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# Positive form

## Simple adjectives and adverbs

# Positive form

## Simple adjectives and adverbs

POS ADJ	translation
a. mudr- <b>yj</b>	'wise'
b. nov- <b>yj</b>	'new'
c. dovh- <b>yj</b>	'long'
d. mal- <b>yj</b>	'small'

# Positive form

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	POS ADJ	translation
a.	mudr- <b>yj</b>	'wise'
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d.	mal- <b>yj</b>	'small'

	POS ADV	translation
a.	mudr- <b>o</b>	'wisely'
b.	nov- <b>o</b>	'newly'
c.	dovh- <b>o</b>	'a long time'
d.	mal- <b>o</b>	'a little'

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# Positive form

## Complex adjectives with *-n*

	noun	POS ADJ	translation
a.	<i>sklad</i> 'storage'	sklad- <b>n</b> - <b>yj</b>	'complex'
b.	<i>rozum</i> 'mind'	rozum- <b>n</b> - <b>yj</b>	'smart'
c.	<i>xolod</i> 'cold'	xolod- <b>n</b> - <b>yj</b>	'cold'

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c.	<i>xolod</i> 'cold'	xolod- <b>n</b> - <b>yj</b>	'cold'
d.	(loan)	militar- <b>n</b> - <b>yj</b>	'military'

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- ▶ an **adjectivizer**

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- ▶ an **adjectivizer**
- ▶ very productive

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c.	<i>xolod</i> 'cold'	xolod- <b>n</b> - <b>yj</b>	'cold'
d.	(loan)	militar- <b>n</b> - <b>yj</b>	'military'

- ▶ an **adjectivizer**
- ▶ very productive
- ▶ can derive loan adjectives

# Positive form

## Complex adjectives and adverbs with *-n*

POS ADJ	translation
a. sklad- <b>n</b> -yj	'complex'
b. rozum- <b>n</b> -yj	'smart'
c. xolod- <b>n</b> -yj	'cold'
d. militar- <b>n</b> -yj	'military'

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## Complex adjectives and adverbs with *-n*

POS ADJ	translation
a. sklad- <b>n-yj</b>	'complex'
b. rozum- <b>n-yj</b>	'smart'
c. xolod- <b>n-yj</b>	'cold'
d. militar- <b>n-yj</b>	'military'

POS ADV	translation
a. sklad- <b>n-o</b>	'complexly'
b. rozum- <b>n-o</b>	'smartly'
c. xolod- <b>n-o</b>	'coldly'
d. militar- <b>n-o</b>	'militarily'

# Positive form

## Complex adjectives with -k

	noun	POS ADJ	translation
a.	<i>dzvin</i> 'bell'	<i>dzvin-k-yj</i>	'resonant'
b.	<i>slyzj</i> 'slime'	<i>slyzj-k-yj</i>	'slimy'
c.	<i>solod</i> 'malt'	<i>solod-k-yj</i>	'sweet'

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a.	<i>dzvin</i> 'bell'	<i>dzvin-k-yj</i>	'resonant'
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c.	<i>solod</i> 'malt'	<i>solod-k-yj</i>	'sweet'
d.	* <i>bryd</i>	<i>bryd-k-yj</i>	'ugly'

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c.	<i>solod</i> 'malt'	<i>solod-k-yj</i>	'sweet'
d.	* <i>bryd</i>	<i>bryd-k-yj</i>	'ugly'

- ▶ an **adjectivizer**

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c.	<i>solod</i> 'malt'	<i>solod-k-yj</i>	'sweet'
d.	* <i>bryd</i>	<i>bryd-k-yj</i>	'ugly'

- ▶ an **adjectivizer**
- ▶ less productive

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c.	<i>solod</i> 'malt'	<i>solod-k-yj</i>	'sweet'
d.	* <i>bryd</i>	<i>bryd-k-yj</i>	'ugly'

- ▶ an **adjectivizer**
- ▶ less productive
- ▶ rarely derives loan adjectives

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## Complex adjectives and adverbs with -k

POS ADJ	translation
a. dzvin- <b>k-yj</b>	'resonant'
b. slyzj- <b>k-yj</b>	'slimy'
c. solod- <b>k-yj</b>	'sweet'
d. bryd- <b>k-yj</b>	'ugly'

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a.	dzvin-k-o	'resonantly'
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a.	mudr- <b>yj</b>	mudr- <b>iš</b> -yj	'wise'
b.	nov- <b>yj</b>	nov- <b>iš</b> -yj	'new'
c.	dovh- <b>yj</b>	dov- <b>š</b> -yj	'long'
d.	mal- <b>yj</b>	men- <b>š</b> -yj	'small'

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	POS ADV	CMPR ADV	translation
a.	mudr- <b>o</b>	mudr- <b>iš-e</b>	'wisely'
b.	nov- <b>o</b>	nov- <b>iš-e</b>	'newly'
c.	dovh- <b>o</b>	dov- <b>š-e</b>	'a long time'
d.	mal- <b>o</b>	men- <b>š-e</b>	'a little'

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- ▶ either **-š** or **-iš** suffix is used

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c.	dovh- <b>yj</b>	dov- <b>š-yj</b>	'long'
d.	mal- <b>yj</b>	men- <b>š-yj</b>	'small'

	POS ADV	CMPR ADV	translation
a.	mudr- <b>o</b>	mudr- <b>iš-e</b>	'wisely'
b.	nov- <b>o</b>	nov- <b>iš-e</b>	'newly'
c.	dovh- <b>o</b>	dov- <b>š-e</b>	'a long time'
d.	mal- <b>o</b>	men- <b>š-e</b>	'a little'

- ▶ either **-š** or **-iš** suffix is used
- ▶ the suffix that is used in the adjective is used in the corresponding adverb (Bevzenko 1960: 386).

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b.	rozum- <b>n</b> -yj	rozum- <b>n</b> -iš-yj	'smart'
c.	xolod- <b>n</b> -yj	xolod- <b>n</b> -iš-yj	'cold'
d.	militar- <b>n</b> -yj	militar- <b>n</b> -iš-yj	'military'

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c.	xolod- <b>n</b> -yj	xolod- <b>n</b> -iš-yj	'cold'
d.	militar- <b>n</b> -yj	militar- <b>n</b> -iš-yj	'military'

	POS ADV	CMPR ADV	translation
a.	sklad- <b>n</b> -o	sklad- <b>n</b> -iš-e	'complexly'
b.	rozum- <b>n</b> -o	rozum- <b>n</b> -iš-e	'smartly'
c.	xolod- <b>n</b> -o	xolod- <b>n</b> -iš-e	'coldly'
d.	militar- <b>n</b> -o	militar- <b>n</b> -iš-e	'militarily'

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c.	xolod- <b>n</b> -yj	xolod- <b>n</b> -iš-yj	'cold'
d.	militar- <b>n</b> -yj	militar- <b>n</b> -iš-yj	'military'

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c.	xolod- <b>n</b> -o	xolod- <b>n</b> -iš-e	'coldly'
d.	militar- <b>n</b> -o	militar- <b>n</b> -iš-e	'militarily'

- ▶ -**n** is always kept in the comparative
- ▶ -**n** is always followed by -iš

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### Complex adjectives and adverbs with *-k*: Option 1

## Comparative form

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	POS ADJ	CMPR ADJ	translation
a.	dzvin- <b>k</b> -yj	dzvin- <b>k</b> -iš-yj	'resonant'
b.	slyzj- <b>k</b> -yj	slyzj- <b>k</b> -iš-yj	'slimy'
c.	bryd- <b>k</b> -yj	bryd- <b>k</b> -iš-yj	'ugly'
d.	rid- <b>k</b> -yj	rid- <b>k</b> -iš-yj	'liquid'

## Comparative form

### Complex adjectives and adverbs with *-k*: Option 1

	POS ADJ	CMPR ADJ	translation
a.	dzvin- <b>k</b> -yj	dzvin- <b>k</b> -iš-yj	'resonant'
b.	slyzj- <b>k</b> -yj	slyzj- <b>k</b> -iš-yj	'slimy'
c.	bryd- <b>k</b> -yj	bryd- <b>k</b> -iš-yj	'ugly'
d.	rid- <b>k</b> -yj	rid- <b>k</b> -iš-yj	'liquid'

	POS ADV	CMPR ADV	translation
a.	dzvin- <b>k</b> -o	dzvin- <b>k</b> -iš-e	'resonantly'
b.	slyzj- <b>k</b> -o	slyzj- <b>k</b> -iš-e	'slimily'
c.	bryd- <b>k</b> -o	mil- <b>k</b> -iš-e	'ugly'
d.	rid- <b>k</b> -o	rid- <b>k</b> -iš-e	'liquid'

## Comparative form

### Complex adjectives and adverbs with *-k*: Option 1

	POS ADJ	CMPR ADJ	translation
a.	dzvin- <b>k</b> -yj	dzvin- <b>k</b> -iš-yj	'resonant'
b.	slyzj- <b>k</b> -yj	slyzj- <b>k</b> -iš-yj	'slimy'
c.	bryd- <b>k</b> -yj	bryd- <b>k</b> -iš-yj	'ugly'
d.	rid- <b>k</b> -yj	rid- <b>k</b> -iš-yj	'liquid'

	POS ADV	CMPR ADV	translation
a.	dzvin- <b>k</b> -o	dzvin- <b>k</b> -iš-e	'resonantly'
b.	slyzj- <b>k</b> -o	slyzj- <b>k</b> -iš-e	'slimily'
c.	bryd- <b>k</b> -o	mil- <b>k</b> -iš-e	'ugly'
d.	rid- <b>k</b> -o	rid- <b>k</b> -iš-e	'liquid'

- ▶ -**k** is kept in the comparative
- ▶ in such case -**k** is always followed by -iš

## Comparative form

### Complex adjectives and adverbs with *-k*: Option 2

## Comparative form

### Complex adjectives and adverbs with *-k*: Option 2

POS ADJ	CMPR ADJ	translation
a. korot- <b>k</b> -yj	korot- <b>š</b> -yj	'short'
b. tiaž- <b>k</b> -yj	tiaž- <b>č</b> -yj	'heavy'
c. švyd- <b>k</b> -yj	švyd- <b>š</b> -yj	'fast'
d. solod- <b>k</b> -yj	solod- <b>š</b> -yj	'sweet'

## Comparative form

### Complex adjectives and adverbs with *-k*: Option 2

	POS ADJ	CMPR ADJ	translation
a.	korot- <b>k</b> -yj	korot- <b>š</b> -yj	'short'
b.	tiaž- <b>k</b> -yj	tiaž- <b>č</b> -yj	'heavy'
c.	švyd- <b>k</b> -yj	švyd- <b>š</b> -yj	'fast'
d.	solod- <b>k</b> -yj	solod- <b>š</b> -yj	'sweet'

	POS ADV	CMPR ADV	translation
a.	korot- <b>k</b> -o	korot- <b>š</b> -e	'short'
b.	tiaž- <b>k</b> -o	tiaž- <b>č</b> -e	'heavily'
c.	švyd- <b>k</b> -o	švyd- <b>š</b> -e	'fast'
d.	solod- <b>k</b> -o	solod- <b>š</b> -e	'sweetly'

## Comparative form

### Complex adjectives and adverbs with *-k*: Option 2

POS ADJ	CMPR ADJ	translation
a. korot- <b>k</b> -yj	korot-š-yj	'short'
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c. švyd- <b>k</b> -yj	švyd-š-yj	'fast'
d. solod- <b>k</b> -yj	solod-š-yj	'sweet'

POS ADV	CMPR ADV	translation
a. korot- <b>k</b> -o	korot-š-e	'short'
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c. švyd- <b>k</b> -o	švyd-š-e	'fast'
d. solod- <b>k</b> -o	solod-š-e	'sweetly'

- ▶ -**k** is dropped in the comparative
- ▶ in such case -š is always used

# Overview of patterns

## ► Adjectives

POS	CMPR
-AGR	- <b>š</b> -AGR
-AGR	-i <b>š</b> -AGR
-n-AGR	-n-i <b>š</b> -AGR
-k-AGR	-k-i <b>š</b> -AGR
-k-AGR	- <b>š</b> -AGR

# Overview of patterns

## ► Adjectives

POS	CMPR
-AGR	- <b>š</b> -AGR
-AGR	-i <b>š</b> -AGR
-n-AGR	-n-i <b>š</b> -AGR
-k-AGR	-k-i <b>š</b> -AGR
-k-AGR	- <b>š</b> -AGR

## ► Adverbs

POS	CMPR
-ADV	- <b>š</b> -ADV
-ADV	-i <b>š</b> -ADV
-n-ADV	-n-i <b>š</b> -ADV
-k-ADV	-k-i <b>š</b> -ADV
-k-ADV	- <b>š</b> -ADV

# Outline

Introduction

Comparative suffixes

The data: adjectives and adverbs

Ingredients for the analysis

Analysis

Conclusions

# Nanosyntax

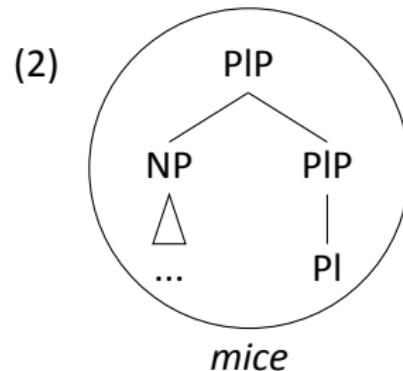
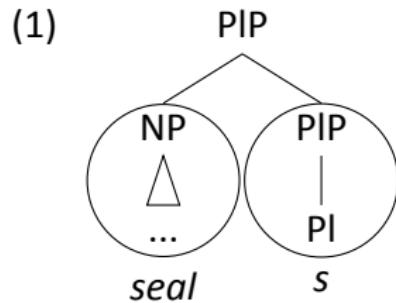
- ▶ submorphemic syntax (there are more featural distinctions than there are morphemes available)

# Nanosyntax

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# Nanosyntax

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## Lexicalisation algorithm (Starke 2018)

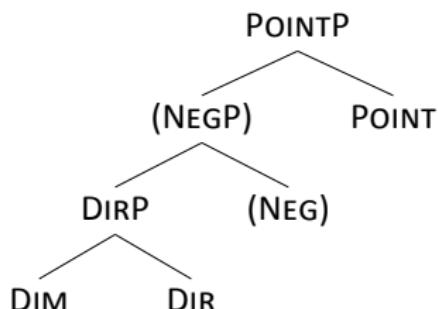
- a. Merge F and lexicalize.
- b. If fail, try a spec-to-spec movement and lexicalize.
- c. If fail, try a movement of the complement of the newly inserted feature and lexicalize.

# The structure of the adjective

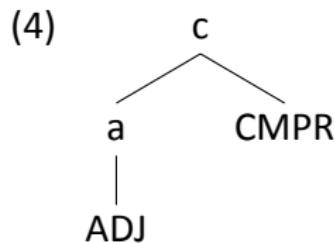
Vanden Wyngaerd et al. (2020):

- ▶ DIMENSION (DIMP) such as size, velocity, height, color;
- ▶ DIRECTION (DIRP) that can be reversed from positive to negative using NEGP;
- ▶ POINT (POINTP) that divides the scale into two parts: one exceeds the point and another one does not.

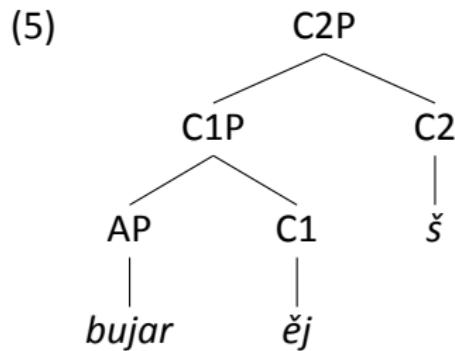
(3)



# The structure of the comparative



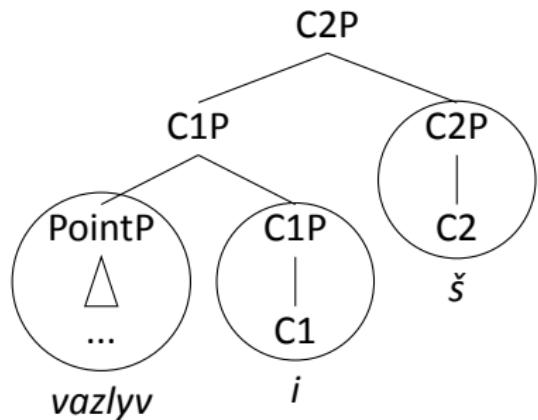
Bobaljik (2012)



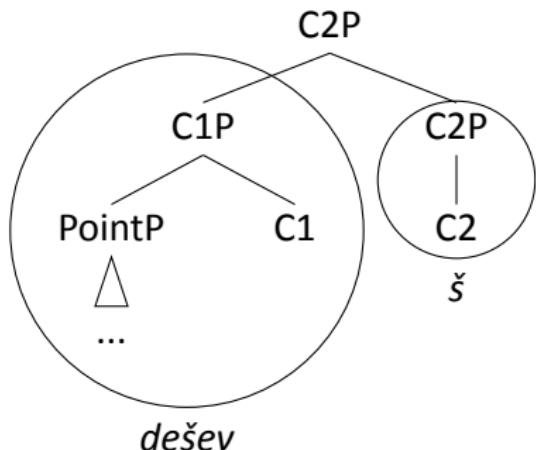
Caha et al. (2019)

# Ukrainian comparatives

(6)



(7)



Vyshnevska (2022)

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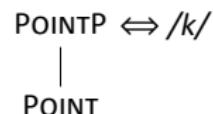
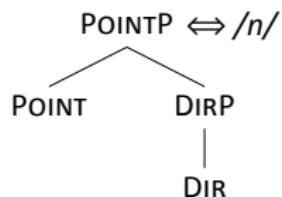
Conclusions

## My main ideas

- ▶ The roots of Ukrainian adjectives and adverbs come in different sizes. The larger the root, the less morphology it needs in the comparative.

# My main ideas

- ▶ The roots of Ukrainian adjectives and adverbs come in different sizes. The larger the root, the less morphology it needs in the comparative.
- ▶ Different suffixes lexicalise different amount of structure. *-n* lexicalises a bigger amount of structure than *-k*.



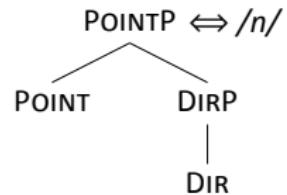
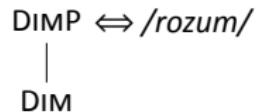
## Ukrainian adjectives: lexicalisation table

root	adjective	Dim	Dir	Point	C1	C2	Agr
XS	smart, POS	rozum		n			yj
	smart, CMPR	rozum		n	-i	-š	yj
S	resonant, POS	dzvin		k			yj
	resonant, CMPR	dzvin		k	-i	-š	yj
M	important, POS		važlyv				yj
	important, CMPR		važlyv		-i	-š	yj
L	cheap, POS		dešev				yj
	cheap, CMPR		dešev			-š	yj

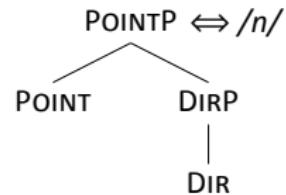
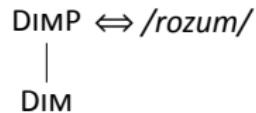
## Ukrainian adverbs: lexicalisation table

root	adverb	Dim	Dir	Point	C1	C2	Adv
XS	smartly, POS	rozum	n				o
	smartly, CMPR	rozum	n		-i	-š	e
S	resonantly, POS	dzvin	k				o
	resonantly, CMPR	dzvin	k		-i	-š	e
M	importantly, POS	važlyv					o
	importantly, CMPR	važlyv			-i	-š	e
L	cheaply, POS	dešev					o
	cheaply, CMPR	dešev				-š	e

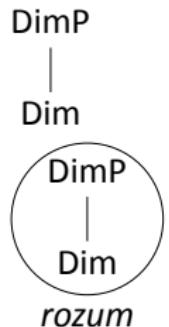
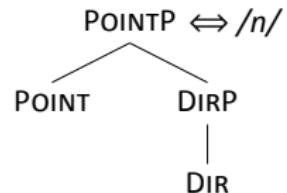
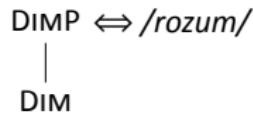
## XS-root: positive



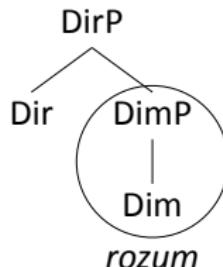
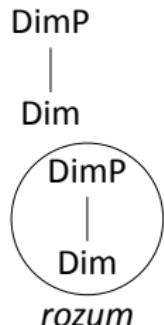
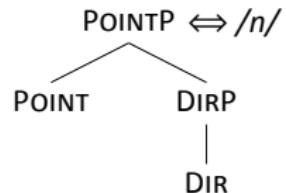
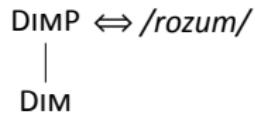
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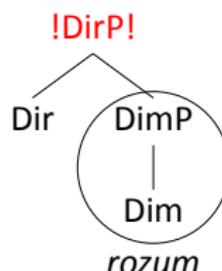
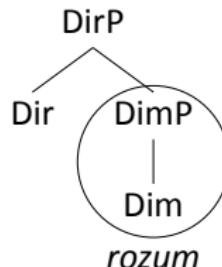
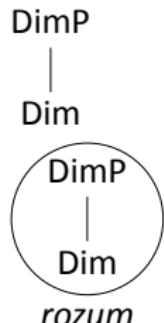
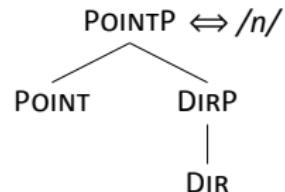
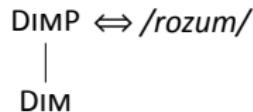
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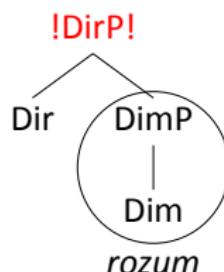
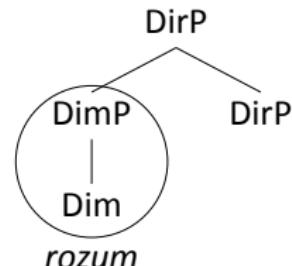
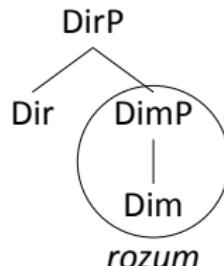
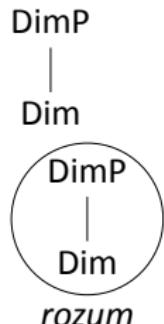
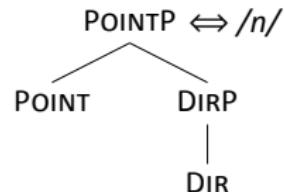
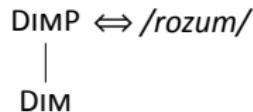
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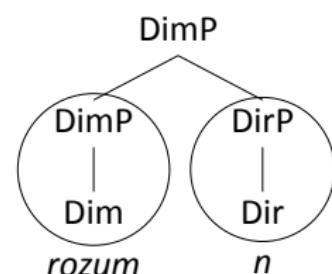
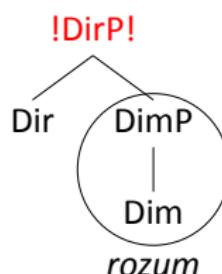
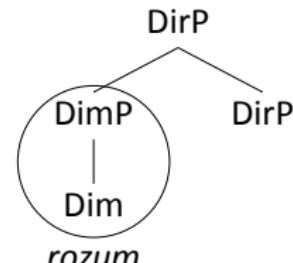
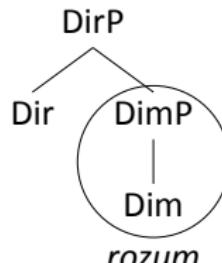
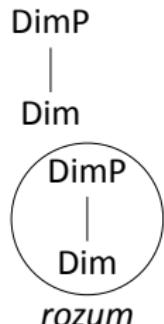
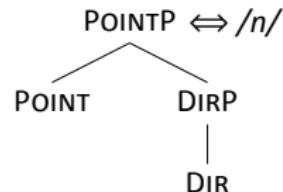
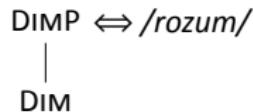
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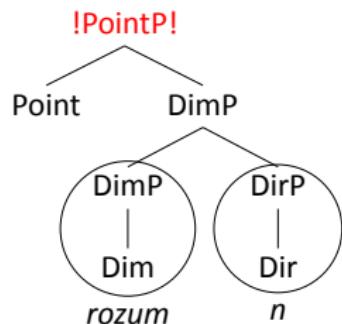
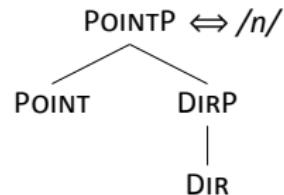
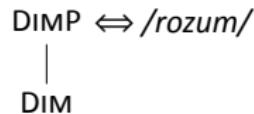


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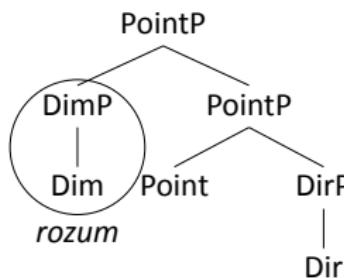
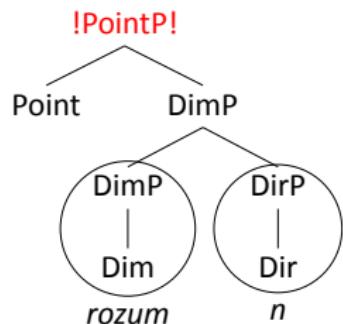
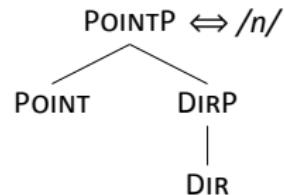
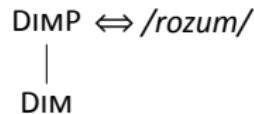
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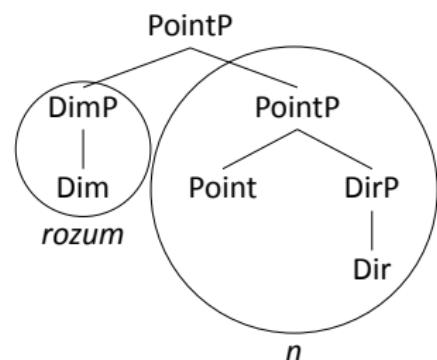
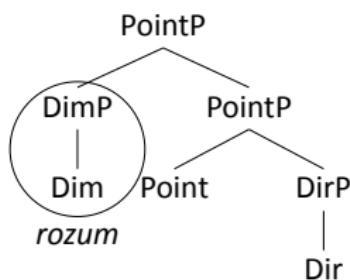
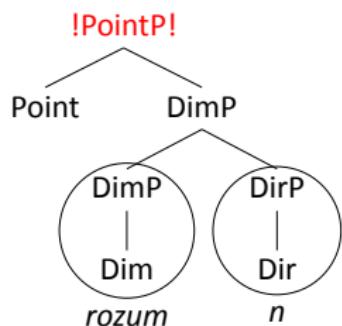
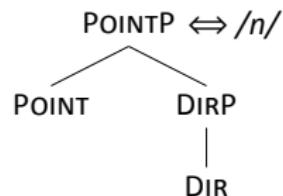
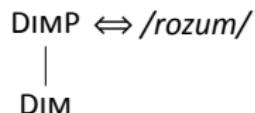
# XS-root: positive



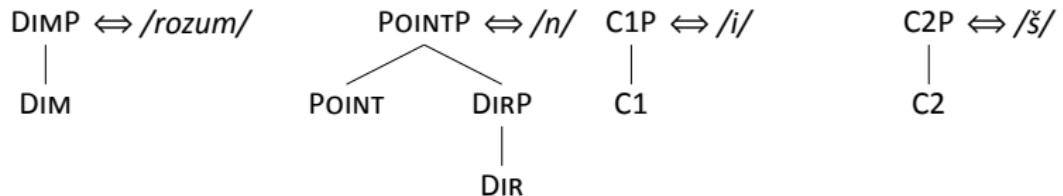
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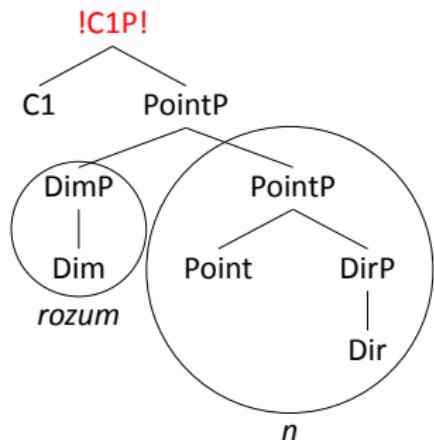
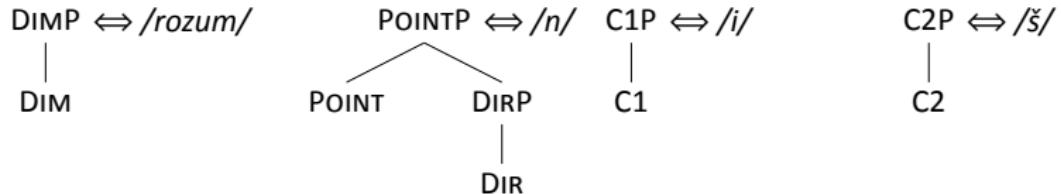
## XS-root: positive



## XS-root: comparative



## XS-root: comparative



## XS-root: comparative

DIMP  $\Leftrightarrow /rozum/$

DIM

POINTP  $\Leftrightarrow /n/$

POINT

DIRP

DIR

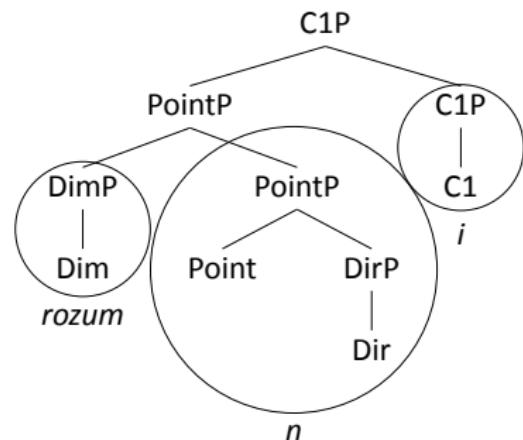
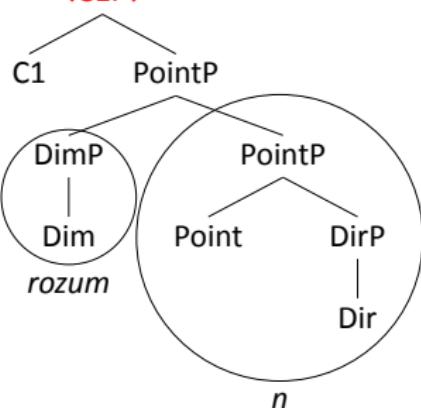
C1P  $\Leftrightarrow /i/$

C1

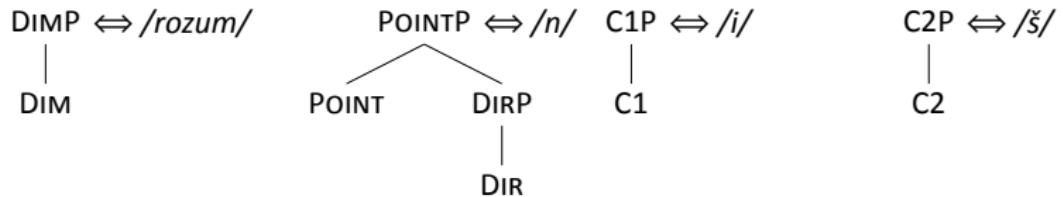
C2P  $\Leftrightarrow /\check{s}/$

C2

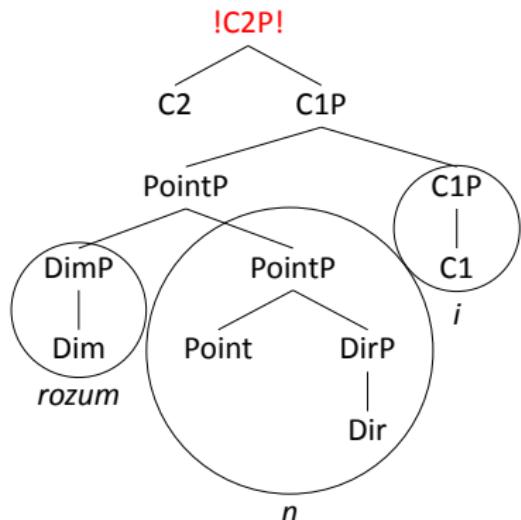
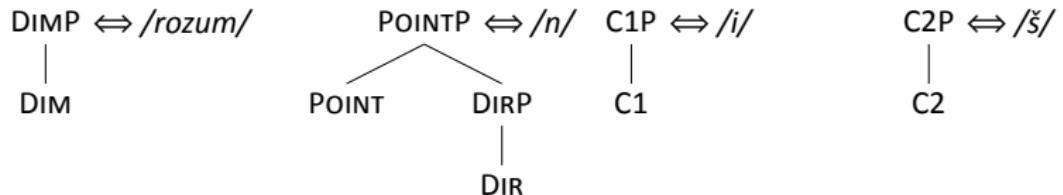
**!C1P!**



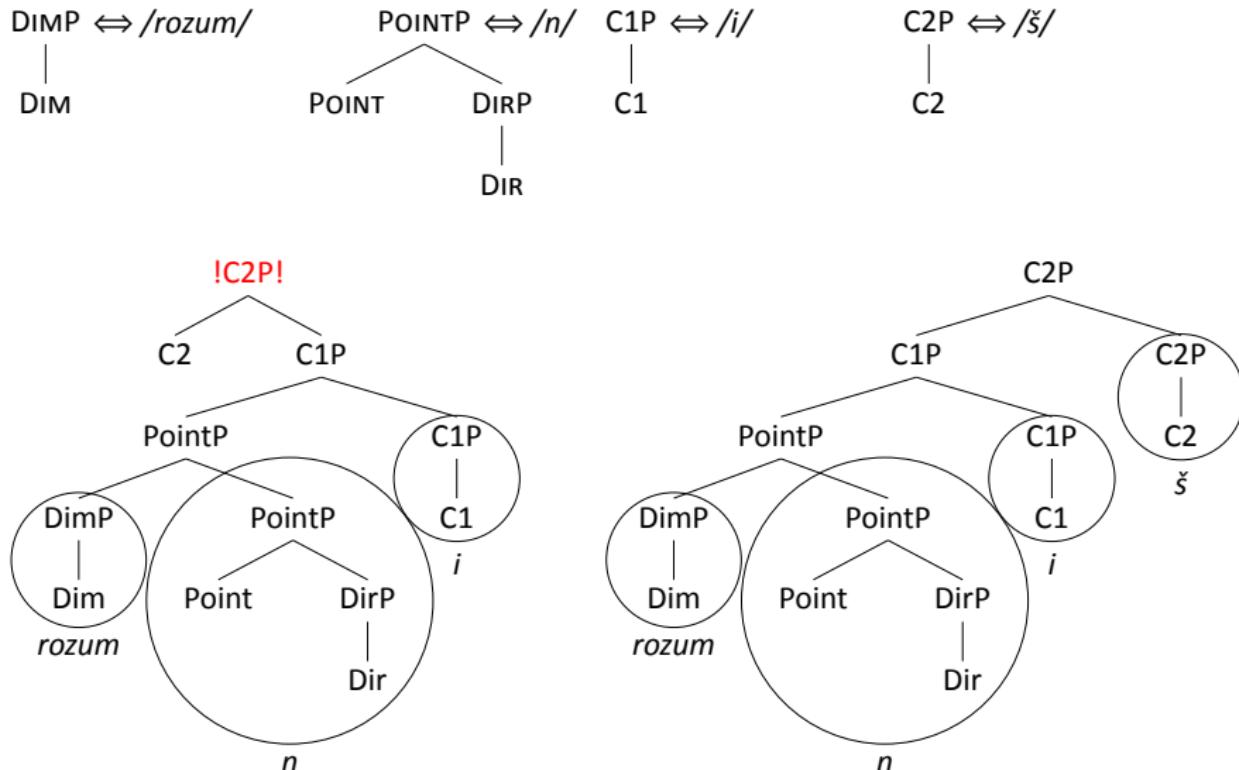
## XS-root: comparative



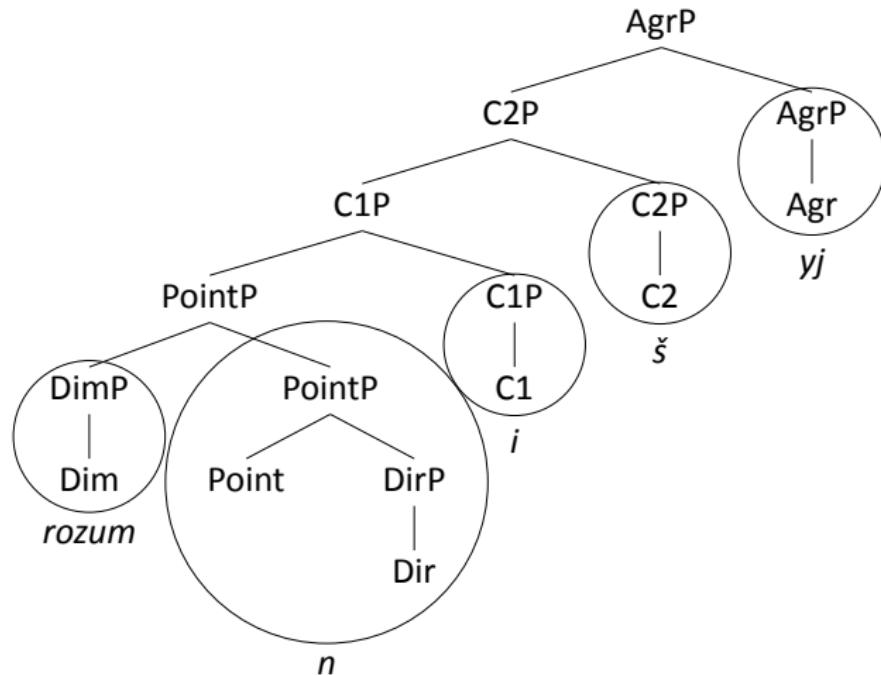
## XS-root: comparative



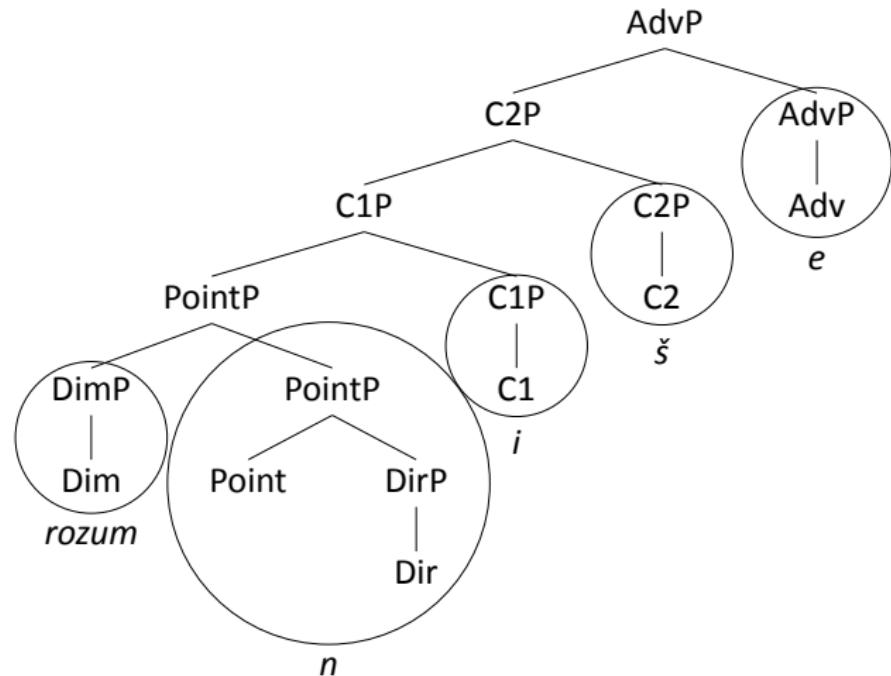
## XS-root: comparative



## XS-root: comparative adjective



## XS-root: comparative adverb

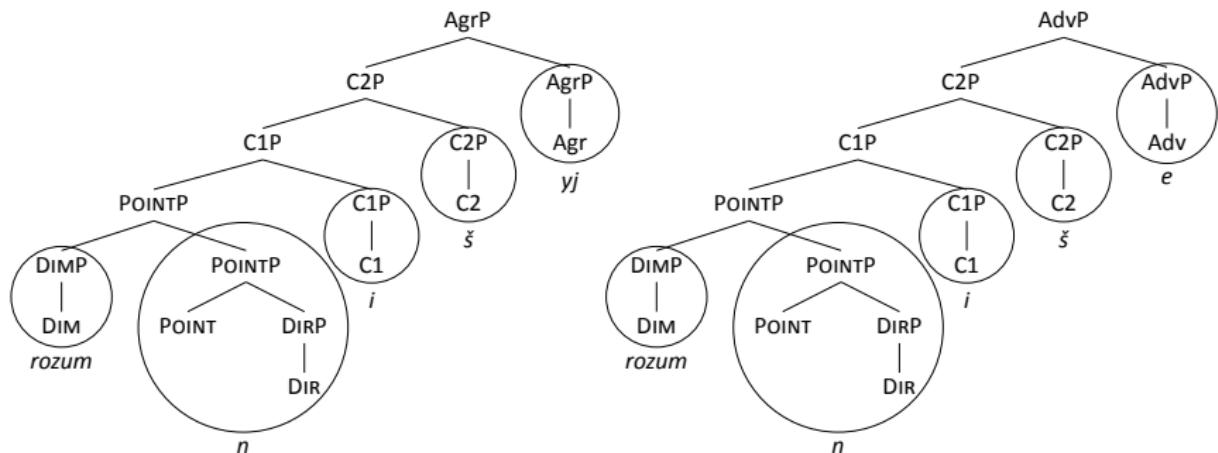


## XS-root: comparative adjective and adverb

POS ADJ	CMPR ADJ	translation	POS ADV	CMPR ADV	translation
rozum-n-yj	rozum-n-i-š-yj	'smart'	rozum-n-o	rozum-n-i-š-e	'smartly'

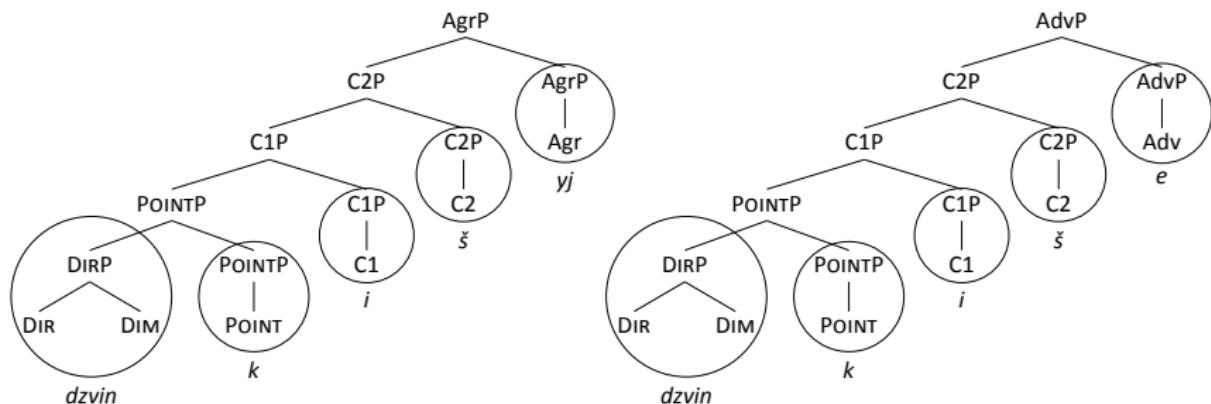
# XS-root: comparative adjective and adverb

POS ADJ	CMPR ADJ	translation	POS ADV	CMPR ADV	translation
rozum-n-yj	rozum-n-i-š-yj	'smart'	rozum-n-o	rozum-n-i-š-e	'smartly'



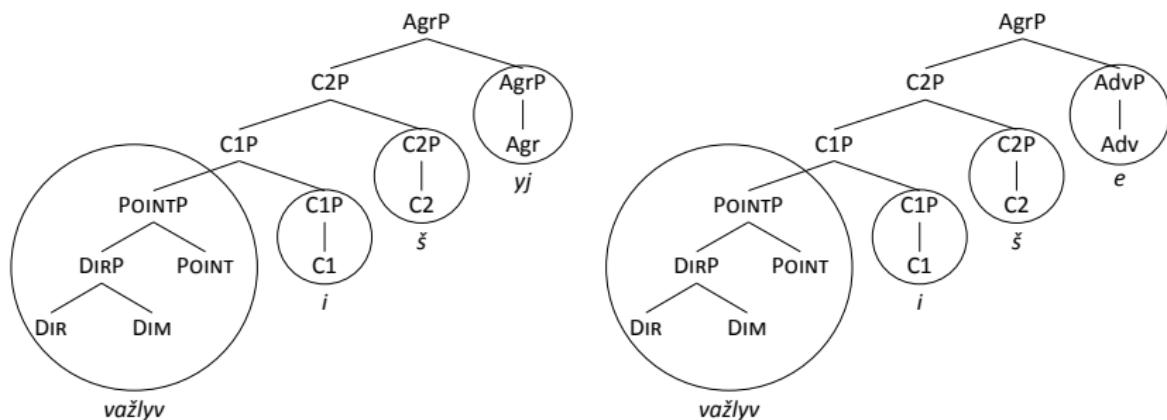
## S-root

POS ADJ	CMPR ADJ	translation	POS ADV	CMPR ADV	translation
dzvin- <b>k</b> -yj	dzvin- <b>k-i-š</b> -yj	'resonant'	dzvin- <b>k</b> -o	dzvin- <b>k-i-š</b> -e	'resonantly'



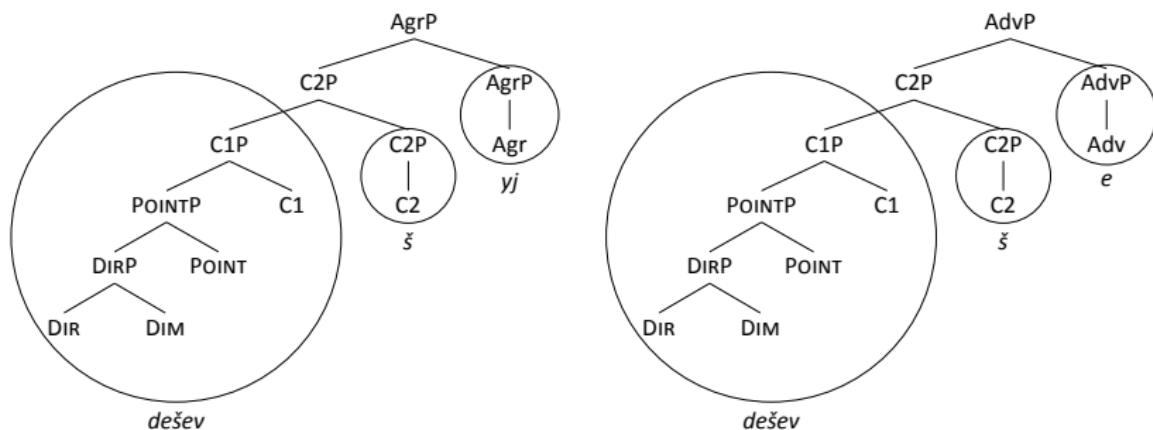
## M-root

POS ADJ	CMPR ADJ	translation	POS ADV	CMPR ADV	translation
važlyv-yj	važlyv-i-š-yj	'important'	važlyv-o	važlyv-i-š-e	'importantly'



# L-root

POS ADJ	CMPR ADJ	translation	POS ADV	CMPR ADV	translation
dešev-yj	dešev-š-yj	'cheap'	dešev-o	dešev-š-e	'cheaply'



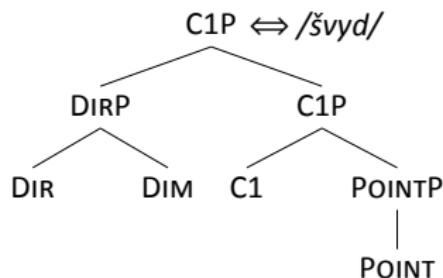
# L'-root

POS ADJ	CMPR ADJ	translation	POS ADV	CMPR ADV	translation
švyd- <b>k</b> -yj	švyd- <b>š</b> -yj	'quick'	švyd- <b>k</b> -o	švyd- <b>š</b> -e	'fast'

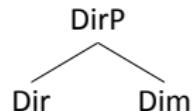
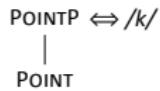
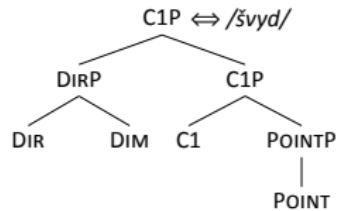
# L'-root

POS ADJ	CMPR ADJ	translation	POS ADV	CMPR ADV	translation
švyd- <b>k</b> -yj	švyd- <b>š</b> -yj	'quick'	švyd- <b>k</b> -o	švyd- <b>š</b> -e	'fast'

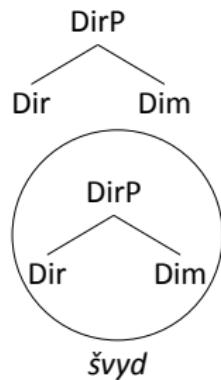
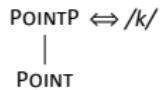
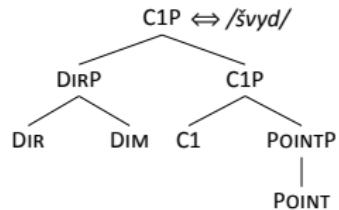
## Complex Left Branch (Blix 2022)



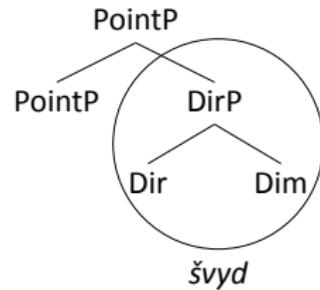
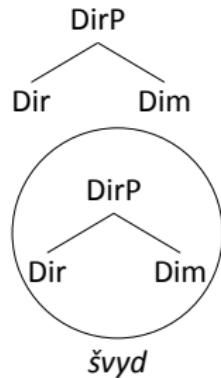
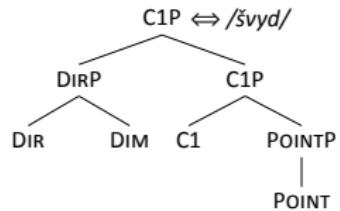
# L' roots: positive



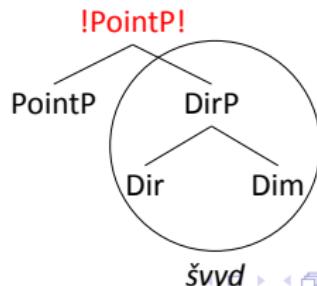
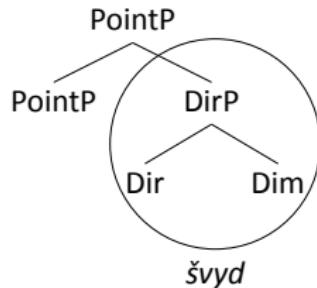
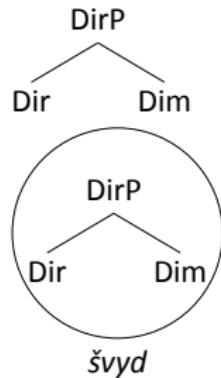
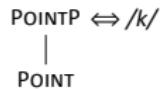
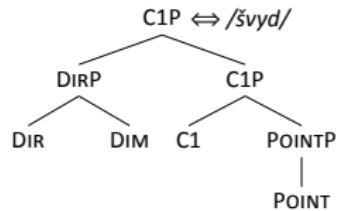
# L' roots: positive



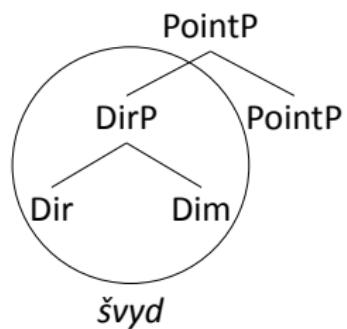
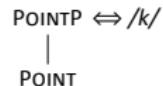
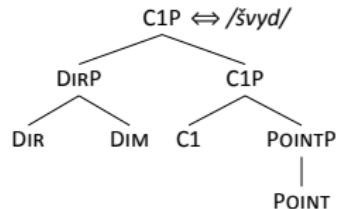
# L' roots: positive



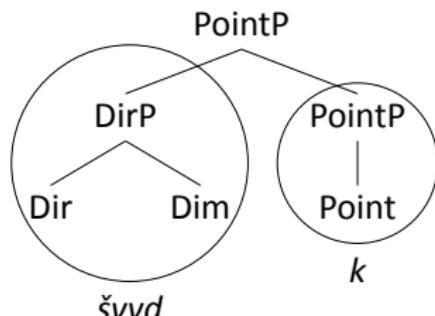
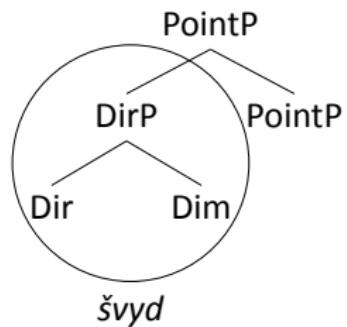
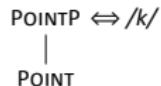
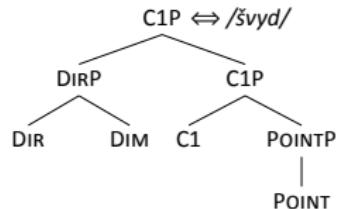
# L' roots: positive



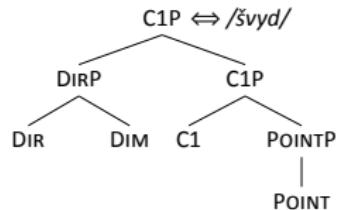
# L' roots: positive



## L' roots: positive

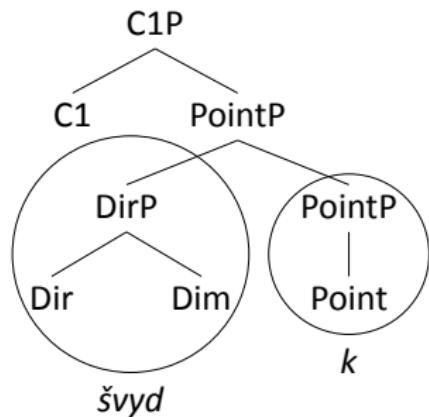


# L' roots: comparative

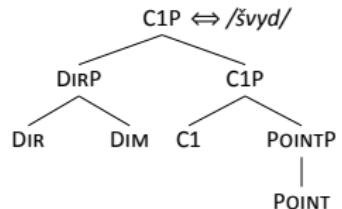


POINTP  $\Leftrightarrow /k/$

```
graph TD; POINTP --> POINT
```

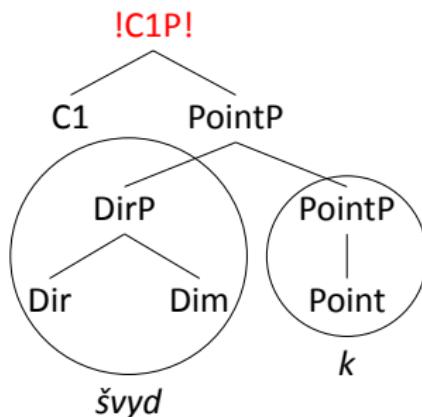
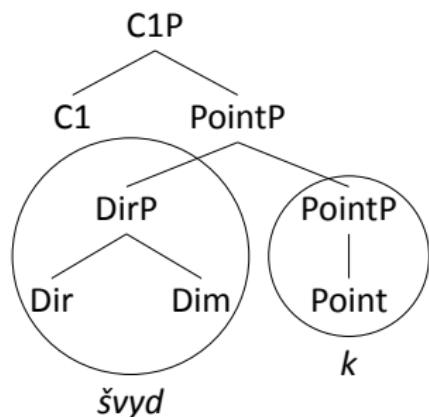


# L' roots: comparative

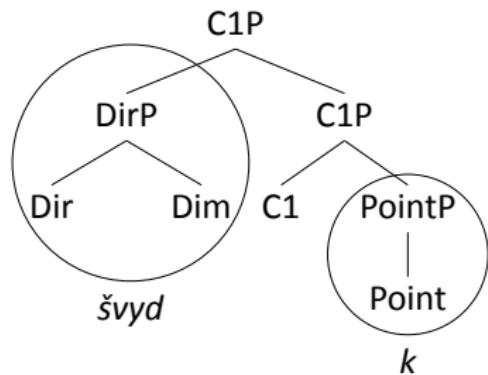
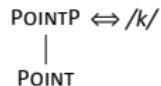
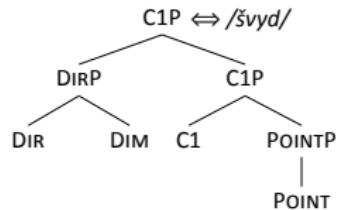


POINTP  $\Leftrightarrow /k/$

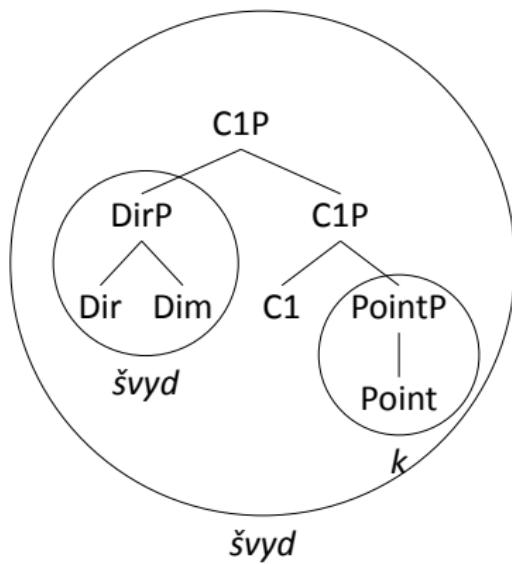
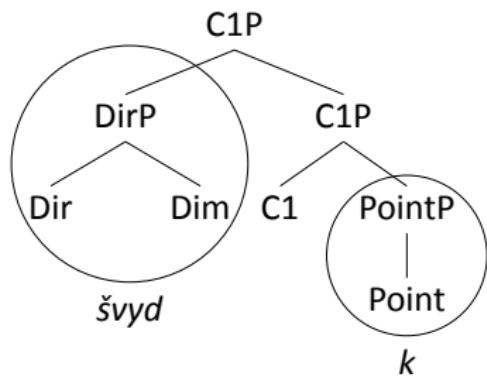
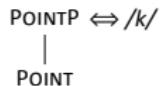
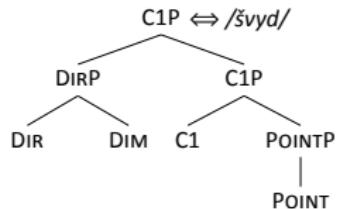
```
POINTP --- POINT
```



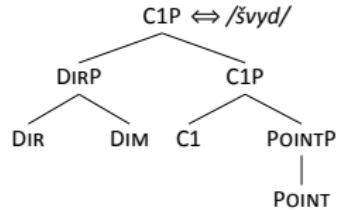
# L' roots: comparative



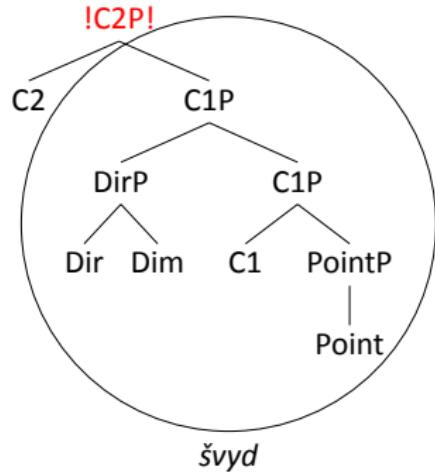
## L' roots: comparative



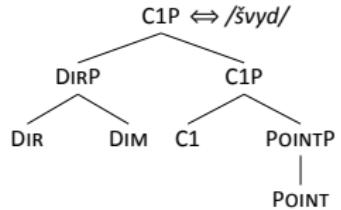
# L' roots: comparative



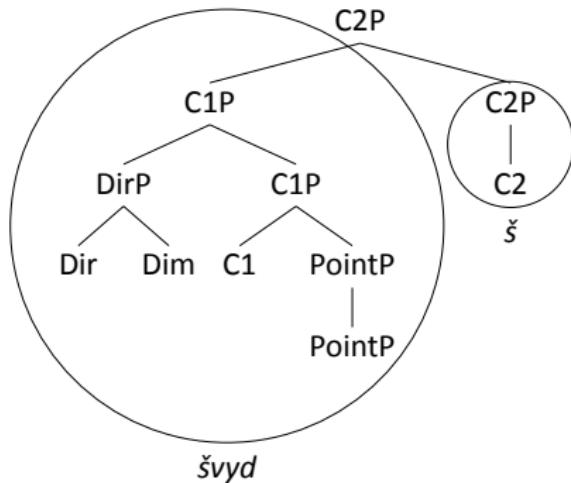
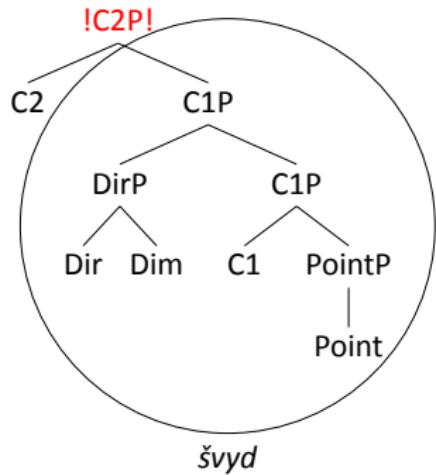
POINTP  $\Leftrightarrow /k/$   
|  
POINT



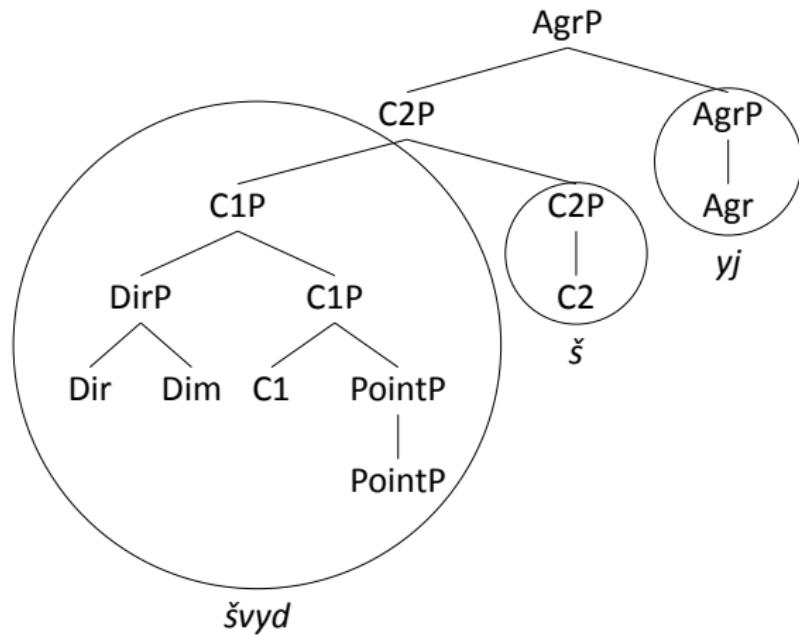
# L' roots: comparative



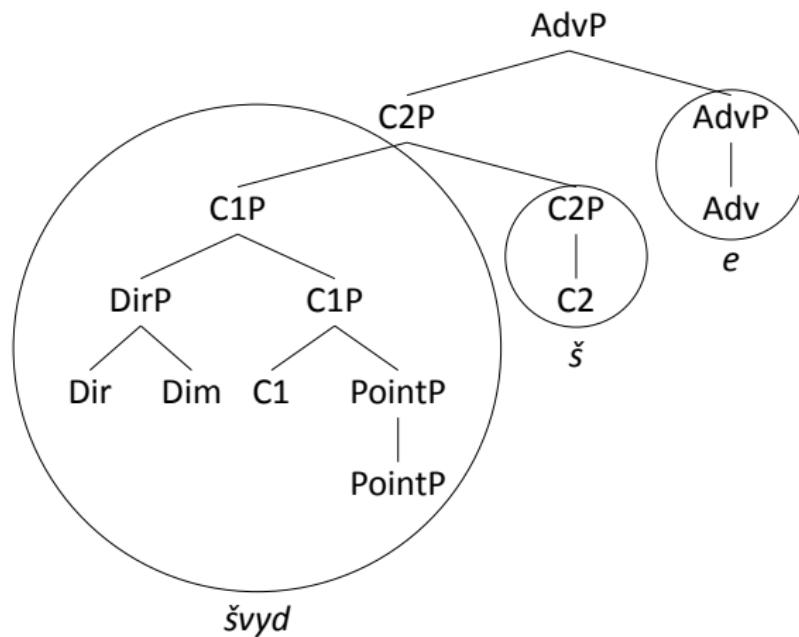
POINTP  $\Leftrightarrow /k/$   
POINT



## L' roots: comparative adjective



## L' roots: comparative adverb

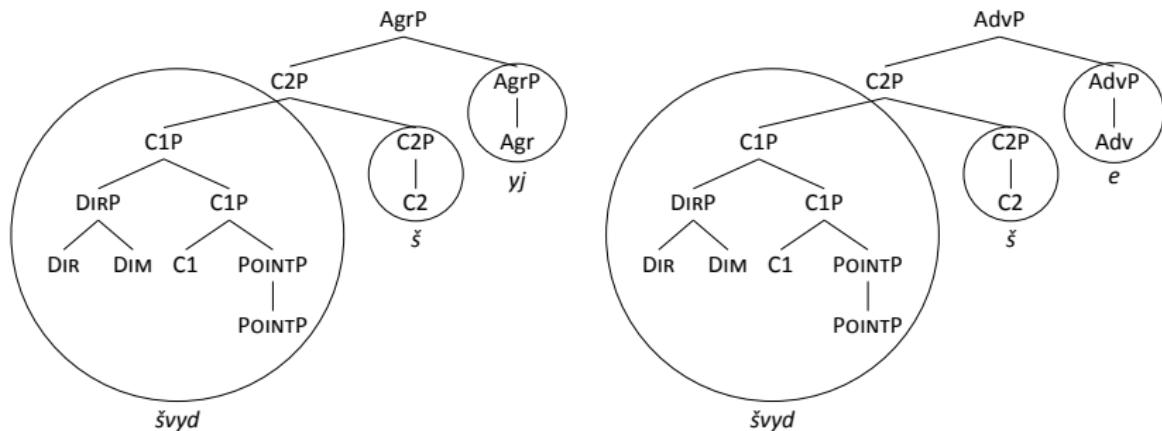


## L'-root: comparative adjective and adverb

POS ADJ	CMPR ADJ	translation	POS ADV	CMPR ADV	translation
švyd- <b>k</b> -yj	švyd- <b>š</b> -yj	'quick'	švyd- <b>k</b> -o	švyd- <b>š</b> -e	'fast'

# L'-root: comparative adjective and adverb

POS ADJ	CMPR ADJ	translation	POS ADV	CMPR ADV	translation
švyd- <b>k</b> -yj	švyd- <b>š</b> -yj	'quick'	švyd- <b>k</b> -o	švyd- <b>š</b> -e	'fast'



## Ukrainian adjectives: lexicalisation table

root	adjective	Dim	Dir	Point	C1	C2	Agr
XS	smart, POS	rozum		n			yj
	smart, CMPR	rozum		n	-i	-š	yj
S	resonant, POS	dzvin		k			yj
	resonant, CMPR	dzvin		k	-i	-š	yj
M	important, POS		važlyv				yj
	important, CMPR		važlyv		-i	-š	yj
L	cheap, POS		dešev				yj
	cheap, CMPR		dešev			-š	yj
L'	quick, POS	švyd		k			yj
	quick, CMPR	švyd		*		-š	yj

## Ukrainian adverbs: lexicalisation table

root	adverb	Dim	Dir	Point	C1	C2	Adv
XS	smartly, POS	rozum	n				o
	smartly, CMPR	rozum	n	-i	-š		e
S	resonantly, POS	dzvin	k				o
	resonantly, CMPR	dzvin	k	-i	-š		e
M	importantly, POS	važlyv					o
	importantly, CMPR	važlyv		-i	-š		e
L	cheaply, POS	dešev					o
	cheaply, CMPR	dešev			-š		e
L'	fast, POS	švyd	k				o
	fast, CMPR	švyd	*		-š		e

# Outline

Introduction

Comparative suffixes

The data: adjectives and adverbs

Ingredients for the analysis

Analysis

Conclusions

# Conclusions

- I presented different adjectival and adverbial patterns

POS	CMPR
-AGR	-š-AGR
-AGR	-iš-AGR
-n-AGR	-n-iš-AGR
-k-AGR	-k-iš-AGR
-k-AGR	-š-AGR

POS	CMPR
-ADV	-š-ADV
-ADV	-iš-ADV
-n-ADV	-n-iš-ADV
-k-ADV	-k-iš-ADV
-k-ADV	-š-ADV

# Conclusions

- ▶ I presented different adjectival and adverbial patterns

POS	CMPR	POS	CMPR
-AGR	-š-AGR	-ADV	-š-ADV
-AGR	-iš-AGR	-ADV	-iš-ADV
-n-AGR	-n-iš-AGR	-n-ADV	-n-iš-ADV
-k-AGR	-k-iš-AGR	-k-ADV	-k-iš-ADV
-k-AGR	-š-AGR	-k-ADV	-š-ADV

- ▶ I accounted for these different patterns using Nanosyntax

# Conclusions

- ▶ I presented different adjectival and adverbial patterns

POS	CMPR	POS	CMPR
-AGR	-š-AGR	-ADV	-š-ADV
-AGR	-iš-AGR	-ADV	-iš-ADV
-n-AGR	-n-iš-AGR	-n-ADV	-n-iš-ADV
-k-AGR	-k-iš-AGR	-k-ADV	-k-iš-ADV
-k-AGR	-š-AGR	-k-ADV	-š-ADV

- ▶ I accounted for these different patterns using Nanosyntax
- ▶ I suggested that Ukrainian adjectives have rich internal structure
- ▶ and Ukrainian adverbs share their internal structure with adjectives

Дякую за увагу!  
Dyakuju za uvahu!

# References

- Bevzenko, Stepan Pylypovych. 1960. *Istoryčna morfolohia ukrain'skoji movy. 'the historical morphology of the ukrainian language'*. Uzhhorod: Zakarpats'ke Oblastne Vydavnytstvo.
- Blix, Hagen. 2022. Interface legibility and nominal classification: A nanosyntactic account of Kipsigis singulatives. *Glossa* 7(1). 1–46.
- Bobaljik, Jonathan. 2012. *Universals in comparative morphology*. Cambridge, MA: MIT Press.
- Caha, Pavel, Karen De Clercq & Guido Vanden Wyngaerd. 2019. The fine structure of the comparative. *Studia Linguistica* 73(3). 470–521. doi:<https://doi.org/10.1111/stul.12107>.
- Pancheva, Roumyana. 2024. The grammar of property concepts and its consequences for a decompositional approach to gradable adjectives. CRISSP Lecture Series on Comparison.
- Starke, Michal. 2009. Nanosyntax: A short primer to a new approach to language. *Nordlyd* 36. 1–6.
- Starke, Michal. 2018. Complex left branches, spellout, and prefixes. In Lena Baunaz, Karen De Clercq, Liliane Haegeman & Eric Lander (eds.), *Exploring nanosyntax*. 239–249. Oxford: Oxford University Press.
- Vanden Wyngaerd, Guido, Michal Starke, Karen De Clercq & Pavel Caha. 2020. How to be positive. *Glossa* 5(1). 23. 1–34.
- Vyshnevská, Anastasiia. 2022. There is more to the morphology of -š/-iš: the comparative in Ukrainian. *Linguistics in the Netherlands* 39. 263–278.
- Vyshnevská, Anastasiia. 2023. The story of -š/-iš: the comparative in Ukrainian. *Papers of the Linguistic Society of Belgium* 16.

## Appendix 1: adverbs with -e

## Appendix 1: adverbs with -e

	POS ADV	CMPR ADV	translation
a.	dobr-e	dobr-iš-e	'well'
b.	pevn-e	pevn-iš-e	'definitely'
c.	vorož-e	vorož-iš-e	'hostile'

## Appendix 1: adverbs with -e

	POS ADV	CMPR ADV	translation
a.	dobr-e	dobr-iš-e	'well'
b.	pevn-e	pevn-iš-e	'definitely'
c.	vorož-e	vorož-iš-e	'hostile'
d.	zl-e	hir-š-e	'badly'
e.	duž-e	duž-č-e	'a lot'
f.	xoroš-e	kraš-č-e	'well'

## Appendix 1: adverbs with -e

	POS ADV	CMPR ADV	translation
a.	dobr-e	dobr-iš-e	'well'
b.	pevn-e	pevn-iš-e	'definitely'
c.	vorož-e	vorož-iš-e	'hostile'
d.	zl-e	hir-š-e	'badly'
e.	duž-e	duž-č-e	'a lot'
f.	xoroš-e	kraš-č-e	'well'

- ▶ adverbs with -e are far less frequent
- ▶ almost all of them end in a palatalised consonant (Bevzenko 1960: 381)

## Appendix 2a: it's not about phonology

(8) certain adjectives can take both -š and -iš

POS	CMPR -š	CMPR -iš	translation
a.	bahat-yj	bahat-š-yj	rich
b.	hrub-yj	hrub-š-yj	rude
c.	z dorov-yj	z dorov-š-yj	healthy

## Appendix 2b: it's not about phonology

(9) different roots in similar phonological environment

POS	CMPR -š	CMPR -iš	translation
a.	dešev-yj	dešev-š-yj	*dešev-iš-yj cheap
	važlyv-yj	*važlyv-š-yj	važlyv-iš-yj important
b.	duž-yj	duž-č-yj	*duž-iš-yj strong
	sviž-yj	*sviž-č-yj	sviž-iš-yj fresh