

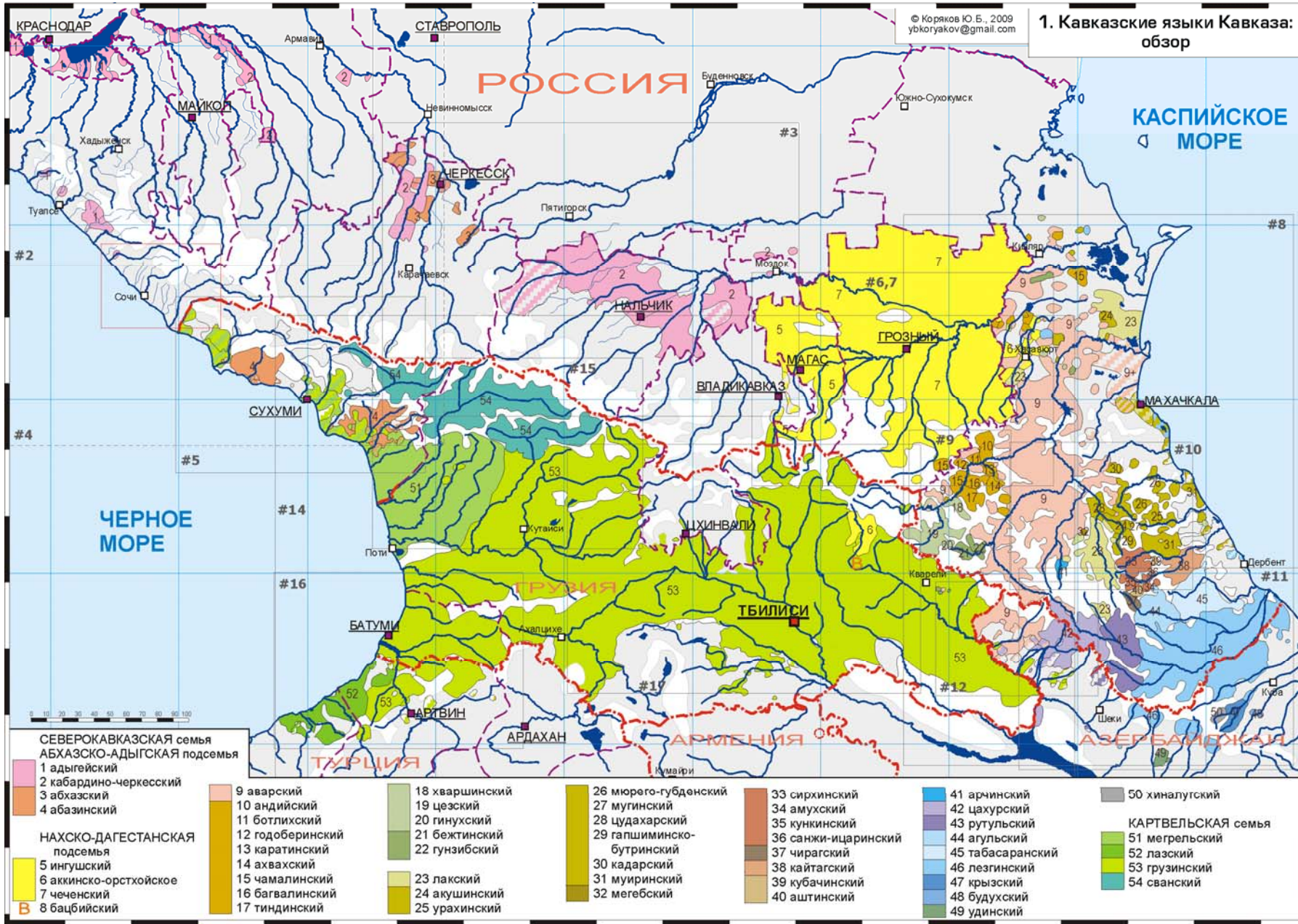
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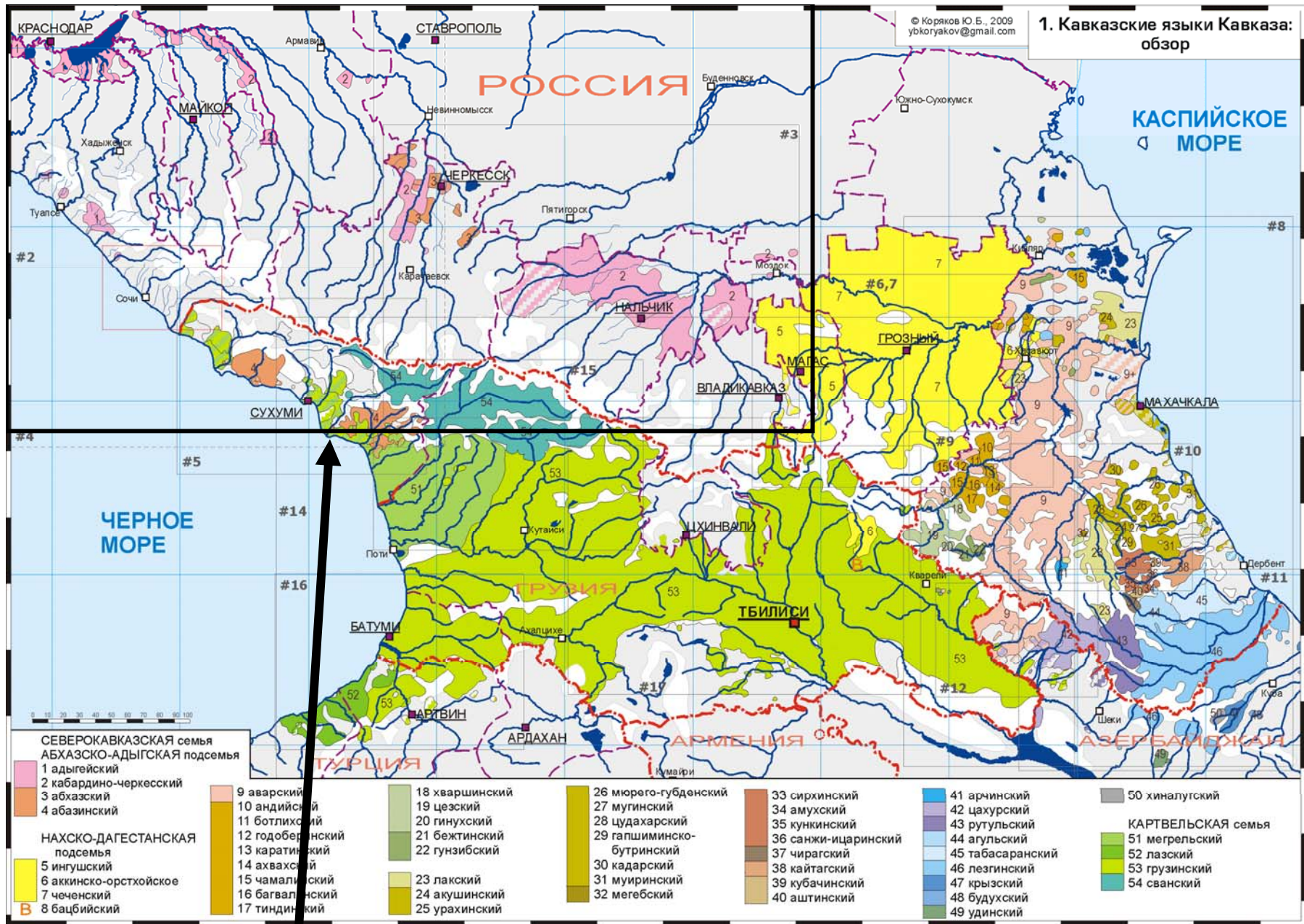
**Interplay of agglutination,
cumulation and overabundance:
non-canonical case-number
paradigm in Adyghe**

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1. Кавказские языки Кавказа:
обзор



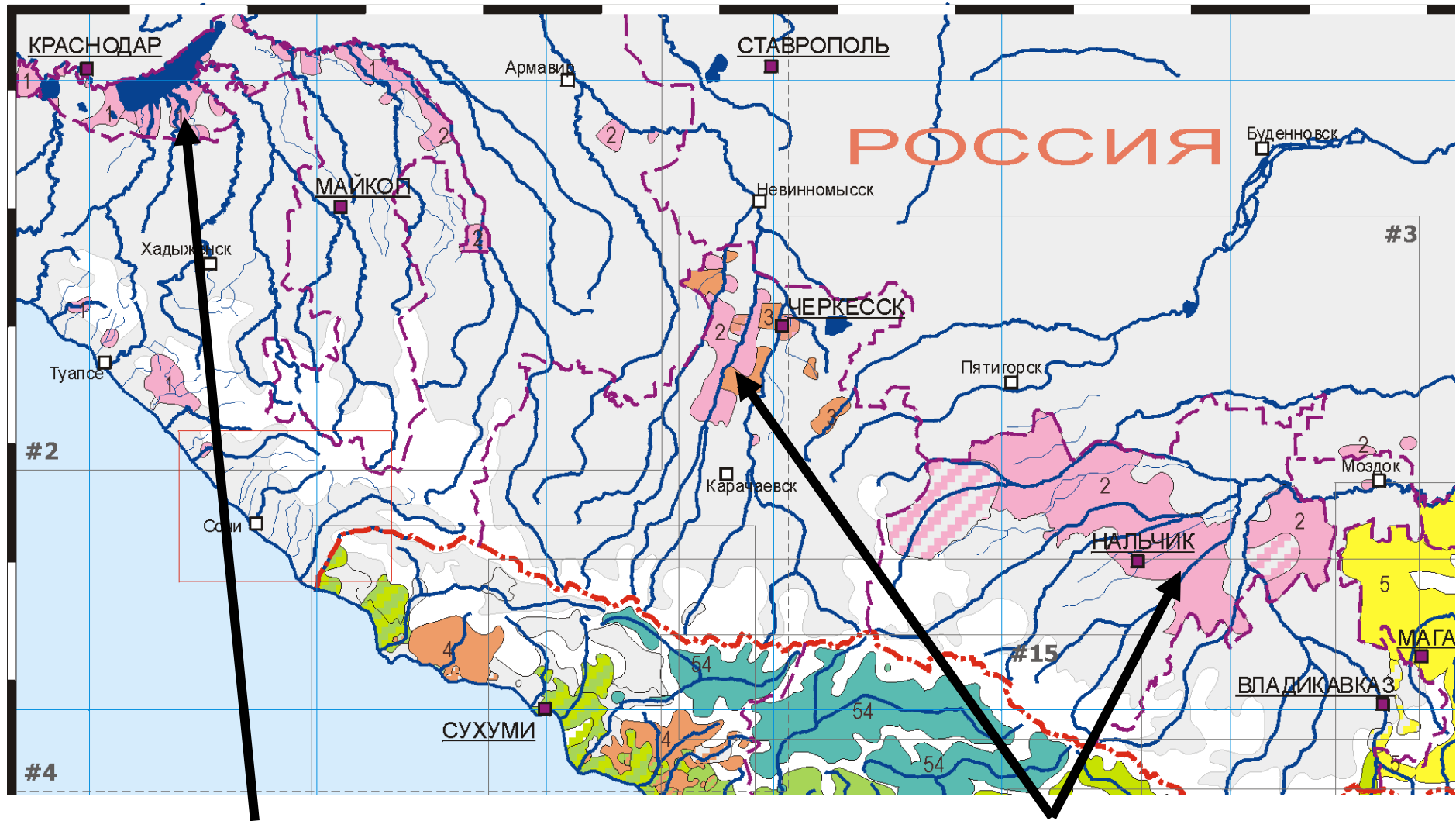


Circassian languages





Adyghe



Adyghe

Kabardian

Typological characteristics

- rich consonantism & poor vocalism
- polysynthesis
- morphological ergativity in both case marking and verbal indexing
- very little distinction between major parts of speech

(Smeets 1984, Kumakhov & Vamling 2009, Testelec ed. 2009)

Adyghe declension

- number:
 - singular (\emptyset) vs. plural (-xe)

Adyghe declension

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- case:
 - absolutive (-r)
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 - instrumental (-č'e)
 - (?) adverbial (-ew)

Adyghe declension

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 - instrumental (-č'e)
 - (?) adverbial (-ew)
- “definiteness”: \pm case, \pm number

The “ideal” Adyghe paradigm

	“definite”		“indefinite”
	SG	PL	
ABS	<i>-r</i>	<i>-xe-r</i>	∅
OBL	<i>-m</i>	<i>-xe-m</i>	
INS	<i>-m-č’e</i>	<i>-xe-m-č’e</i>	<i>-č’e</i>

The “ideal” Adyghe paradigm

	“definite”		“indefinite”
	SG	PL	
ABS	<i>pšâšê-r</i>	<i>pšâšê-xe-r</i>	<i>pšâšê</i>
OBL	<i>pšâšê-m</i>	<i>pšâšê-xe-m</i>	
INS	<i>pšâšê-m-č'e</i>	<i>pšâšê-xe-m-č'e</i>	<i>pšâšê-č'e</i>

PŠÂŠÊ ‘girl’

The real paradigm ("definite" declension)

	SG	PL
ABS	<i>-r</i>	<i>-xe-r</i>
OBL	<i>-m</i>	<i>-xe-m, -me, -xe-me</i>
INS	<i>-m-č'e</i>	<i>-xe-m-č'e</i>

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	SG	PL
ABS	<i>pšaše-r</i>	<i>pšaše-xe-r</i>
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INS	<i>pšaše-m-č'e</i>	<i>pšaše-xe-m-č'e</i>

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-xe-m: PL-OBL (agglutination)

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-me: OBL.PL (cumulation)

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-xe-m: PL-OBL (agglutination)

-me: OBL.PL (cumulation)

-xe-me: PL-OBL.PL (agglutination + cumulation)

Canonical inflection (Corbett 2008, 2011)

	comparison across <i>cells</i> of a lexeme	comparison across <i>lexemes</i>
composition/structure	<i>same</i>	<i>same</i>
lexical material	<i>same</i>	<i>different</i>
inflectional material	<i>different</i>	<i>same</i>
outcome	<i>different</i>	<i>different</i>

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outcome	<i>different</i>	<i>different</i>

Canonical paradigm with agglutination

	SG	PL
NOM	<i>-a</i>	<i>-p-a</i>
ACC	<i>-b</i>	<i>-p-b</i>
GEN	<i>-c</i>	<i>-p-c</i>
DAT	<i>-d</i>	<i>-p-d</i>
LOC	<i>-e</i>	<i>-p-e</i>
ABL	<i>-f</i>	<i>-p-f</i>

Canonical paradigm with agglutination

	SG	PL
NOM	<i>ev-∅</i>	<i>ev-ler-∅</i>
ACC	<i>ev-i</i>	<i>ev-ler-i</i>
GEN	<i>ev-in</i>	<i>ev-ler-in</i>
DAT	<i>ev-e</i>	<i>ev-ler-e</i>
LOC	<i>ev-de</i>	<i>ev-ler-de</i>
ABL	<i>ev-den</i>	<i>ev-ler-den</i>

Turkish,
EV 'house'

Canonical paradigm with cumulation

	SG	PL
NOM	<i>-a</i>	<i>-g</i>
ACC	<i>-b</i>	<i>-h</i>
GEN	<i>-c</i>	<i>-i</i>
DAT	<i>-d</i>	<i>-k</i>
LOC	<i>-e</i>	<i>-l</i>
INS	<i>-f</i>	<i>-m</i>

Canonical paradigm with cumulation

	SG	PL
NOM	<i>miest-as</i>	<i>miest-ai</i>
ACC	<i>miest-ą</i>	<i>miest-us</i>
GEN	<i>miest-o</i>	<i>miest-ų</i>
DAT	<i>miest-ui</i>	<i>miest-ams</i>
LOC	<i>miest-e</i>	<i>miest-uose</i>
INS	<i>miest-u</i>	<i>miest-ais</i>

Lithuanian,
MIESTAS 'city'

The Adyghe paradigm: multiple non-canonicity

	SG	PL
ABS	<i>pšaše-r</i>	<i>pšaše-xe-r</i>
OBL	<i>pšaše-m</i>	<i>pšaše-xe-m,</i> <i>pšaše-me,</i> <i>pšaše-xe-me</i>
INS	<i>pšaše-m-č'e</i>	<i>pšaše-xe-m-č'e</i>

- 1) a cumulative marker in an otherwise agglutinative paradigm

The Adyghe paradigm: multiple non-canonicity

	SG	PL
ABS	<i>-a</i>	<i>-p-a</i>
OBL	<i>-b</i>	<i>-d</i>
INS	<i>-c</i>	<i>-p-c</i>

- 1) a cumulative marker in an otherwise agglutinative paradigm

Not unprecedented, but...

Though cumulative exponents in otherwise “separatist” paradigms are well attested cross-linguistically (see e.g. Plank 1986, 1999), instances where **both** the “separatist” and the cumulative expression of the same bundle of morphosyntactic values **coexist** seem to be very rare or at least underdocumented.

The Adyghe paradigm: multiple non-canonicity

	SG	PL
ABS	<i>pšaše-r</i>	<i>pšaše-xe-r</i>
OBL	<i>pšaše-m</i>	<i>pšaše-xe-m,</i> <i>pšaše-me,</i> <i>pšaše-xe-me</i>
INS	<i>pšaše-m-č'e</i>	<i>pšaše-xe-m-č'e</i>

2) the form of the case marker depends on the shape of the number marker (*inward sensitivity*, Carstairs 1987)

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3) all three kinds of exponence of a single morphosyntactic feature combination are equally grammatical and occur in free variation: *overabundance* (Thornton 2012)

Problems for morphological theory

Most current theories of morphology, such as Paradigm Function Morphology (Stump 2001), Network Morphology (Brown & Hippisley 2012), or Distributed Morphology (Halle & Marantz 1993) incorporate the so-called **Panini's Principle** or **Subset Principle**:

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among morphological rules competing for the exponence of the same bundle of morphosyntactic features the one whose domain of application is more narrowly specified wins

Problems for morphological theory

rule 1: $a \rightarrow b / c \underline{\quad}$

rule 2: $a \rightarrow e / dc \underline{\quad}$

Problems for morphological theory

rule 1: $a \rightarrow b / c _$

rule 2: $a \rightarrow e / dc _$

input: *bdca* \rightarrow ?

Problems for morphological theory

rule 1: $a \rightarrow b / c _$

rule 2: $a \rightarrow e / dc _$

input: *bdca* \rightarrow *bdce*

According to the Panini's Principle, the input *bdca* is subject to the more specific rule 2, not to the less specific rule 1.

Problems for morphological theory

Exponence rules for Adyghe:

(1) num:pl \rightarrow *-xe*

(2) case:abs \rightarrow *-r*

(3) case:obl \rightarrow *-m*

(4) case:ins \rightarrow case:obl + *č'e*

Problems for morphological theory

Exponence rules for Adyghe:

(1) num:pl \rightarrow *-xe*

(2) case:abs \rightarrow *-r*

(3) case:obl \rightarrow *-m*

(4) case:ins \rightarrow case:obl + *č'e*

(5) num:pl & case:obl \rightarrow *-me*

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- (1) num:pl \rightarrow *-xe*
- (2) case:abs \rightarrow *-r*
- (3) case:obl \rightarrow *-m*
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- (5) num:pl & case:obl \rightarrow *-me*

According to Panini's Principle, (5) will always preempt (1) and (3), and therefore forms like *pšaše-xe-m* will never be generated.

Problems for morphological theory

Exponence rules for Adyghe:

- (1) num:pl \rightarrow *-xe*
- (2) case:abs \rightarrow *-r*
- (3) case:obl \rightarrow *-m*
- (4) case:ins \rightarrow case:obl + *č'e*
- (5) num:pl & case:obl \rightarrow *-me*

Solution: optional application of rule (5)

Problems for morphological theory

Exponence rules for Adyghe:

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- (2) case:abs \rightarrow *-r*
- (3) case:obl \rightarrow *-m*
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- (5) num:pl & case:obl \rightarrow *-me*

Moreover, to ensure correct generation of forms, we need not only to make (5) optional, but to allow it to apply to the output of (1), in order to generate forms like *pšaše-xe-me*.

Problems for morphological theory

Exponence rules for Adyghe:

- (1) num:pl \rightarrow *-xe*
- (2) case:abs \rightarrow *-r*
- (3) case:obl \rightarrow *-m*
- (4) case:ins \rightarrow case:obl + *č'e*
- (5) num:pl & case:obl \rightarrow *-me*

If (5) **competes** with (1) and (3), then they belong to the **same** block; but if (5) may apply to the output of (1), then (1) and (5) belong to **different** blocks.

Problems for morphological theory

(3) case:obl \rightarrow -*m*

(4) case:ins \rightarrow case:obl + *č'e*

(5) num:pl & case:obl \rightarrow -*me*

The Instrumental case, which is “parasitic” on the Oblique, does not, however, inherit its allomorphy: morpheme combinations like **-me-č'e* и **-xe-me-č'e* do not exist.

Therefore, additional rules regulating the interaction of (3), (4) and (5) are needed.

Any solutions?

Technical solutions are always possible, but they are not always elegant and do not explain the facts, just describe (and sometimes merely restate) them.

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Technical solutions are always possible, but they are not always elegant and do not explain the facts, just describe (and sometimes merely restate) them.

Would anybody step forward and take the challenge of Adyghe declension?

Conclusions

- Even small and seemingly simple paradigms may turn out highly non-canonical and problematic for standard descriptive tools.
- Just a single deviant cell may render the paradigm non-canonical.

Conclusions

- Optionality and overabundance present especially hard problems for morphological theory:
 - special formal machinery is required to adequately capture them;
 - as in the case of Adyghe, they may bear the large part of the responsibility for the non-canonicity of particular morphological paradigms.

Conclusions

- Circassian languages with their poor nominal inflection can nevertheless present quite non-trivial data for morphological typology and theory.

A wide-angle photograph of a sunflower field. The sunflowers are in full bloom, with bright yellow petals and dark brown centers. The field stretches to the horizon under a clear, light blue sky. In the distance, there are some trees and a small white building. The text is overlaid in the center of the image.

Thank you!
Danke schön!
Köszönöm szépen!
tha ŝwекерsew!

Acknowledgments

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