

Conference on the Languages of the Caucasus, EVA-MPG, Leipzig, 13–15 May 2011

HOLISTIC QUANTIFICATION IN ADYGHE

Peter M. Arkadiev

(Institute of Slavic Studies, Moscow, peterarkadiev@yandex.ru),

Dmitry Gerasimov

(Institute of Linguistic Studies, Saint-Petersburg, dm.gerasimov@gmail.com)

1. Introducing holistic quantification

Under holistic quantification we understand expressions semantically equivalent or close to English *whole* in (1) or Russian *celyj* in (2).

- (1) ... *if one brick was removed the whole library was liable to collapse.* [F. Scott Fitzgerald. *The Great Gatsby*]
- (2) ... *šokoladu sjedala za den' celuju korobku ...* [Ivan Bunin, *Čistyj ponedel'nik*]
 'she used to eat a whole box of chocolates in a single day'.

Haspelmath (1995: 366, emphasis ours): “‘whole’ and ‘all’ both express the notion of completeness or totality, differing mainly in that ‘whole’ is used for single objects, while ‘all’ is used for sets (or aggregates) of objects”.

Moltmann (2005: 628): “*whole* involves mapping an entity to the sum of all its actual parts”.

2. Introducing relevant aspects of Adyghe

Most of the data comes from the Temirgoy dialect of Adyghe (North-West Caucasian) and has been collected during the fieldtrip to village Kabehabl organized by the Russian State University for the Humanities in July–August 2010.

2.1. Adyghe is a polysynthetic language: all argument positions in the clause (absolutive, transitive agent, indirect object and objects introduced by applicatives, including locative preverbs) are marked on the verb by cross-referencing prefixes.

- (3) *sə-qə-d-de-p-fə-Ø-r-a-ka-že-š'tə-ɸ*
 1SG.ABS-DIR-1PL.IO-COM-2SG.IO-BEN-3SG.IO-DAT-3PL.A-CAUS-read-AUX-PST
 ‘They were making me read it to you together with us.’ (Yury Lander, p.c.)

3rd person singular absolutive and indirect object prefixes are null and will not be further marked in the glosses.

2.2. In Adyghe, the distinction between nouns and verbs is almost vanishing (cf. Lander & Testelefs 2006; Arkadiev et al. 2009: 30–37): any lexical root except for personal pronouns and demonstratives can function both as a predicate (and be marked for tense, mood, agreement, negation etc.) or as an argument (and be marked for case) without any special nominalizing or verbalizing morphemes. Cf. (4a,b):

- (4a) *č'ale-r qe-k'e-š't.* (4b) *qe-k'e-š'tə-r č'ale.*
 boy-ABS DIR-come-FUT DIR-come-FUT-ABS boy
 ‘The boy will come.’ ‘The one who will come is a boy.’

There are, however, certain diagnostics yielding different results for nouns and verbs, and some of these diagnostics have to do with quantification (see below).

2.3. The core of the noun phrase is constituted by the so-called nominal complex which consists of the head noun together with adjectival or nominal modifiers and/or numerals forming a prosodic and morphophonological unit. The left edge of the nominal complex is signaled by possessive prefixes (if present), while the right edge is filled by affixes of plural and case.

- (5) *s-jə-šwelk-žene-daxe-xe-r*
 1SG.PR-POSS-silk-dress-beautiful-ABS
 ‘my beautiful silk dresses’ (Yury Lander, p.c.)

2.4. Quantification in Adyghe is usually expressed by determiner or adjective-like elements in the NP (see Nikolaeva 2011 for a comprehensive survey).

Determiner *zeč'e* is indeterminate between ‘all’ and ‘whole’, being able to modify both singular (6a) and plural (6b) NPs.

- (6a) *zeč'e č'ale-r qə-ze-ɽ'ə-č'a-Ɂ.*
 all village-ABS DIR-REC.IO-LOC-meet-PST
 ‘The whole village gathered.’ (Vodoždokov (ed.) 1960: 78)

- (6b) *zeč'e s-jə-nəbžək'ə-xe-r k'e-ž'ə-ka-xe-x.*
 all 1SG.PR-POSS-friend-PL-ABS go-RE-PST-ANT-PL.ABS
 ‘All my friends have already gone away.’ (ibid.: 112)

Quantificational adjective *psawə* is mostly used as a ‘whole’-type quantifier (7a), and retains its original meaning ‘intact, unbroken; healthy’ (7b), as well:

- (7a) *wəpče pepč dwəneje psaw wa-pašhe qə-r-j-e-ke-wəc'we.*
 question each world whole 2SG-in.front DIR-LOC-3SG.A-DYN-CAUS-stand
 ‘Each question raises a whole world in front of you.’¹

- (7b) *č'aške-r psaw.*
 cup-ABS whole
 ‘The cup is not broken.’ (Vodoždokov (ed.) 1960: 1010)

3. The *zere...-ew* quantificational construction

We will focus on another ‘whole’-type expression in Adyghe, which is peculiar in many respects and, as far as we know, has not been described before (except for some remarks in Nikolaeva 2011).

The construction in question is formed by the “circumfix” *zere...-ew* consisting of a polyfunctional prefix *zere-* mostly used for clausal subordination (see Gerasimov & Arkadiev 2007, Arkadiev & Gerasimov 2009) and the suffix *-ew* forming adjuncts and secondary predicates (cf. Vydrin 2008).

3.1. Two syntactic options:

- the quantified nominal complex is included into the construction as a whole and turned into an adverbial modifier or a secondary predicate, while the corresponding argument position is filled by a putative null pronoun (8a);
- the nominal complex consisting of a mass noun (e.g. ‘milk’) and a measure expression (e.g. ‘glass’) is “split” so that the mass noun occupies the argument position while the measure word is turned into a secondary predicate (8b).

- (8a) *zere-š'e-stakan-ew* (∅) *jə-s-š'ə-Ɂ.*
 HOL-milk-glass-ADV LOC-1SG.A-drink-PST
 ‘I drank the whole glass of milk.’

¹ <http://www.adygvoice.ru/newsview.php?uid=3715>

- (8b) *š'e-r zere-stakan-ew jə-s-š^wə-β*
 milk-ABS HOL-glass-ADV LOC-1SG.A-drink-PST
 'id.'

Cf. an ordinary nominal complex in the argument position (8c):

- (8c) *š'e-stakanə-r jə-s-š^wə-β.*
 milk-glass-ABS LOC-1SG.A-drink-PST
 'I drank a glass of milk.'

3.2. Nominal expressions of the following kinds appear in the *zere...-ew* construction:

- measure phrases denoting a certain amount of substance (8);
- phrases containing numerals and denoting intervals of space (9) and time (10), or sets of objects (11) or animate beings (12):

- (9) *se zere-kjəlwemjetr-jə-pš-ew λes.ew qe-s-κ^wə-β.*
 I HOL-kilometer-LNK-ten-ADV on.foot DIR-1SG.A-go-TR-PST
 'I have covered the whole 10 kilometers on my way here on foot.'

- (10) *mə-š' dež'ə-m se zere-səhat-jə-č^w-ew sə-š'ə-sə-β.*
 this-OBL at-OBL I HOL-hour-LNK-two-ADV 1SG.ABS-LOC-sit-PST
 'I have spent the whole two hours sitting here.'

- (11) *zere-steč'an-jə-č^w-ew r-jə-š^wə-β.*
 HOL-glass-LNK-two-ADV LOC-3SG.A-drink-PST
 'He drank two whole glasses.'

- (12) *tə-zere-nebγər-jə-pλ-ew psəχ^we-m tə-κ^wa-β.*
 1PL.ABS-HOL-person-LNK-four-ADV river-OBL 1PL.ABS-go-PST
 'All four of us went to the river.'

- nominals denoting groups or sets of individual objects, both inanimate (13), (14) and animate (15):

- (13) *zere-bjəbljəwetjek-ew mə txəλə-r če-λ-ep.*
 HOL-library-ADV this book-ABS LOC-lie-NEG
 'In the whole library this book is not present.'

- (14) *zere-g^wəš'ə?əλ-ew mə g^wəš'ə?e-r de-t-ep.*
 HOL-dictionary-ADV this word-ABS LOC-stand-NEG
 'This word lacks in the whole dictionary.'

- (15) *se zere-brjəgad-ew s-e-še.*
 I HOL-crew-ADV 1SG.A-DYN-know
 'I know everybody in the crew (lit. the whole crew).'

- mass nominals (16), (17) — NB such examples are not accepted by all of our consultants; this suggests that the construction is gradually extending into the domain of 'all'-type quantification (cf. Haspelmath 1995: 366–367), cf. a comparable use of German *ganz* in (18).

- (16) %*zere-l-ew s-šxə-βe.*
 HOL-meat-ADV 1SG.A-eat-PST
 'I ate all the meat.'

- (17) %*zere-?aš^w-ew s-šxə-š't.*
 HOL-sweet-ADV 1SG.A-eat-FUT
 'I'll eat all the sweets.'

- (18) *Das ganze Wasser ist verschwunden!*
 'The whole water has disappeared!' (Haspelmath 1995: 367)

– proper names denoting areas, cities etc. (19):

- (19) *adəjjejə-m əčʲjə zere-tjemər-kavkaz-ew a-šʹə-psewə-re*
 Adygheja-OBL and HOL-North-Caucasus-ADV 3PL.IO-LOC-live-DYN
çəf-λepq-zefešhafə-be-me...
 man-nation-various-many-OBL.PL
 ‘many diverse nations who live in the Adyghe Republic and in the whole North
 Caucasus’²

Quite complex nominal expressions containing numerous modifiers can appear “inside” the *zere...-ew* construction, cf. (20). Note that in traditional Adyghe orthography complex nominals such as the one shown in (20) are spelled as several separate words.

- (20) *zere-sene-pλəžʹ-stečʹan-žed-ew r-jə-šʹə-B.*
 HOL-wine-red-glass-big-ADV LOC-3SG.A-drink-PST
 ‘He emptied (= drank down) the large glass of red wine.’

☞ It must also be noted that the nominal quantified by the *zere...-ew* construction is always interpreted as definite.

3.3. By contrast, the following types of nominal expressions never appear in the *zere...-ew* construction:

– nominals overtly marked as plural (21a); this shows that the construction has not advanced so far along the universal path from ‘whole’ to ‘all’ (Haspelmath 1995: 364–367) as examples like (16) and (17) might suggest.

- (21a) **šʹe-r zere-stečʹan-x-ew jə-s-šʹə-B.*
 milk-ABS HOL-glass-PL-ADV LOC-1SG.A-drink-PST
 expected: ‘I drank all the glasses of milk’.

The meaning of (21) can only be expressed by a different quantifier, cf. (21b) with a floating ‘all’:

- (21b) *šʹe-stečʹan-xe-r zečʹe-r-jə jə-s-šʹə-B.*
 milk-glass-PL-ABS all-ABS-ADD LOC-1SG.A-drink-PST
 ‘I drank all the glasses of milk.’

Note that the “external” nominal linked to the holistically quantified measure expression can well be marked plural (22):

- (22) *məʔerəse-xe-r zere-šʹal-ew qe-s-šʹefə-B.*
 apple-PL-ABS HOL-bucket-ADV DIR-1SG.A-buy-PST
 ‘I bought a whole bucket of apples.’

– nominals containing possessive prefixes, which can appear neither after (23a) nor before (23b) *zere*:

- (23a) **zere-s-jə-psə-stečʹan-ew r-jə-šʹə-B.*
 HOL-1SG.PR-POSS-water-glass-ADV LOC-3SG.A-drink-PST
 (23b) **s-jə-zere-psə-stečʹan-ew r-jə-šʹə-B.*
 1SG.PR-POSS-HOL-water-glass-ADV LOC-3SG.A-drink-PST
 intended: ‘He drank the whole of my glass of water.’

However, naturally occurring examples of this kind are attested:

- (24) *zere-t-jə-λepq-ew hajnapə qə-s-e-χʹəλe-tə-be.*
 HOL-1PL.PR-POSS-nation-ADV disgrace DIR-1SG.IO-DAT-happen-FUT-PST
 ‘... I would have caused disgrace for the whole of our people.’³

² <http://www.adygvoice.ru/newsview.php?uid=2781>

³ <http://www.vraznotyk.ru/index-b-index-446131.php5>

– “zero-nominalized” verbal expressions (“participles”):

(25a) *q-ə-š'efə-ɤe-r* *s-šxə-ɤe.*
 DIR-3SG.A-buy-PST-ABS 1SG.A-eat-PST
 ‘I have eaten what s/he had bought.’

(25b) **zere-q-ə-š'efə-ɤ-ew* *s-šxə-ɤe.*
 HOL-DIR-3SG.A-buy-PST-ADV 1SG.A-eat-PST
 intended: ‘I ate the whole of what s/he had bought.’

The ban on (25b) could be due to the fact that in the verbal complex the prefix *zere-* occurs after rather than before the directional preverb *q(e)-*; however, (25c) with the “regular” order of morphemes cannot be interpreted as holistic quantification, but only as a temporal adjunct (see below on the polysemy of *zere-*).

(25c) #*qə-zer-jə-š'efə-ɤ-ew* *s-šxə-ɤe.*
 DIR-TEMP-3SG.A-buy-PST-ADV 1SG.A-eat-PST
 ‘As soon as s/he bought it, I ate it.’ / *‘I ate the whole of what s/he had bought.’

Not surprisingly, the *zere...-ew* construction cannot embed negation, cf. (26a); the meaning ‘not completely’ is expressed by the clausal negation on the main predicate (26b):

(26a) **zere-mə-steč'an-ew* *r-jə-š'ə-ɤ.*
 HOL-NEG-glass-ADV LOC-3SG.A-drink-PST

(26b) *zere-steč'an-ew* *r-jə-š'ə-ɤ-ep.*
 HOL-glass-ADV LOC-3SG.A-drink-PST-NEG
 ‘S/he did not drink the whole glass.’

☞ Thus, the quantificational *zere...-ew* construction can be used as a diagnostic for distinguishing between nouns and verbs in Adyghe (cf. Nikolaeva 2011 for similar observations about other quantifiers).

3.4. The construction can correspond to NPs occupying the following syntactic positions:

- absolutive object of a transitive predicate (8) and numerous other examples;
- absolutive subject of an intransitive predicate (12);
- oblique (ergative) subject of a transitive predicate:

(27) *zere-λepq-ew* *tjewəbətəɤe* *pəte* *t-šə-n* *faje*
 HOL-nation-ADV firmness hard 1PL.A-do-POT must
tə-bze *tə-mə-ɤe-k'edə-n-ew.*
 1PL.PR-language 1PL.A-NEG-CAUS-dissappear-POT-ADV
 ‘We must have a firm determination as a whole people not to lose our language.’⁴

- locative argument introduced by a preverb (13), (14), (28):

(28) *a-xe-m* *a-rə-k'wəš'əč'-jə* *zere-dwənaj-ew* *jə-teq'əha-ɤe...*
 that-PL-OBL 3PL.IO-LOC-move.out-ADD HOL-world-ADV LOC-scatter-PST
 ‘[the Adyghe people] moved from there and scattered all over the world.’⁵

- adnominal possessor:

(29) *zere-adəγe-λepq-ew* *ja-g'əxəč'*
 HOL-Adyghe-nation-ADV 3PL.PR-resentment
 ‘the resentment of the whole Adyghe nation’⁶

⁴ <http://www.adygvoice.ru/newsview.php?uid=3492>

⁵ http://www.circassiancenter.com/cc-turkiye/tarih/139_kril.htm

⁶ http://www.kafkasyaforumu.org/index.php?option=com_content&view=article&id=275:cerkeslerden-cerkes-soykirimini-taniyin-cagrisi&catid=7:aktuel&Itemid=205

Interestingly, *zere...-ew*-phrases can quantify over entities which are referred to by 1st and 2nd person (plural) pronominals in the verbal complex, cf. (27) and (30):

- (30) *zere-q^waž-ew qjənə-m tə-xe-t.*
 HOL-village-ADV grief-OBL 1PL.ABS-LOC-stand
 ‘We, the whole village, are in grief.’⁷

In such examples *zere...-ew*-phrases are most similar to depictive secondary predicates, which also employ the adverbial suffix *-ew*, cf. (31):

- (31) *ramazan č’ef-ew mweskva qə-š’j-e-k^wahe.*
 Ramazan jolly-ADV Moscow DIR-LOC-3SG.A-DYN-go.round
 ‘Ramazan, being joyful, is walking around Moscow.’ (Vydrin 2008: 426)

However, as is shown by Vydrin (2008), depictive (participant-oriented) expressions in Adyghe require overt agreement in person and number with their 1st or 2nd person controller, cf. (32):

- (32) *we wə-λapç-ew wə-q-jə-č’ə-β.*
 you(SG) 2SG.ABS-barefooted-ADV 2SG.ABS-DIR-LOC-exit-PST
 ‘You went out barefooted.’ (Vydrin 2008: 429)

In case of the quantificational secondary predicates in *zere...-ew* such agreement is at least not obligatory, cf. (27), (30) without agreement and (33) (= 12) with agreement:

- (33) *tə-zere-nebγər-jə-pλ-ew psəχ^we-m tə-k^wa-β.*
 1PL.ABS-HOL-person-LNK-four-ADV river-OBL 1PL.ABS-go-PST
 ‘All four of us went to the river.’

4. Putative origins of the holistic *zere...-ew* construction

Though not much is known about cross-linguistically attested sources of expressions of the ‘whole’-type quantification (see Haspelmath 1995: 366, 368), it could be argued that such quantifiers systematically derive from lexical items meaning ‘intact, unbroken’, like Russian *celyj*, German *ganz*, or Adyghe *psawə*, see ex. (7). Morphological expressions of this meaning as found in Adyghe are supposedly exceptional.

Possible sources of the holistic quantification construction in *zere...-ew* should be naturally sought in the other uses of this fairly polyfunctional expression (see Arkadiev & Gerasimov 2009).

Two of such uses seem to be of particular relevance:

– the similitive construction ‘like P’:

- (34) *zere-s-txə-β-ew p-txə-š’t-ep.*
 MNR-1SG.A-write-PST-ADV 2SG.A-write-FUT-NEG
 ‘You won’t (be able to) write like I have written.’

– the ‘as soon as P / while P’ construction (see Gerasimov & Arkadiev 2007):

- (35) *č’ale-r zere-čəj-ew wəne-m r-a-xə-β.*
 boy-ABS TEMP-sleep-ADV house-OBL LOC-3PL.A-carry-PST
 ‘While the boy was sleeping, they carried him out of the house.’

Both these uses of the *zere...-ew* construction are “verbal” in the sense that they primarily attach to verbs and refer to eventualities rather than to entities. However, since, as has been noted in § 2.2, both verbs and nouns can function as predicates in Adyghe, the “verbal” uses of the construction are perfectly combinable with nouns, cf. (36):

⁷ <http://www.elot.ru/forum/viewtopic.php?t=4861&view=previous&sid=38a077ed0554df801691f41f4f406abd>

- (36) *se sə-zere-stwədjent-ew txələ-r s-txə-βe.*
 I 1SG.ABS-TEMP-student-ADV book-ABS 1SG.A-write-PST
 ‘I wrote a book while I was a student.’

☞ We hypothesize that there is a semantic link between the temporal (‘while P’) construction and the holistic quantification construction.

As a possible intermediate stage could serve depictive expressions denoting groups of people or aggregates of objects existing on a “temporary basis”. Consider again (12) (= 37), which can be paraphrased as ‘we went to the river while we were four persons’:

- (37) *tə-zere-nebγər-jə-pλ-ew psəχ^we-m tə-κ^wa-β.*
 1PL.ABS-HOL-person-LNK-four-ADV river-OBL 1PL.ABS-go-PST
 ‘All four of us went to the river.’

From examples like (37), the construction could be extended to other depictive contexts such as (38) (= 26) (‘we, being a whole nation, must ...’) or (39) (= 29) (‘we, being the whole village, are...’):

- (38) *zere-λepq-ew tjewəbətəβe pətə t-šə-n faje*
 HOL-nation-ADV firmness hard 1PL.A-do-POT must
tə-bze tə-mə-βe-κ^wedə-n-ew.
 1PL.PR-language 1PL.A-NEG-CAUS-dissappear-POT-ADV
 ‘We must have a firm determination as a whole people not to lose our language.’⁸

- (39) *zere-q^waž-ew qjanə-m tə-xe-t.*
 HOL-village-ADV grief-OBL 1PL.ABS-LOC-stand
 ‘We, the whole village, are in grief.’⁹

The meaning of holistic quantification could have probably originated from a “maximalization” implicature associated with definite set-denoting NPs (see e.g. Landman 1998), which later got conventionalized as an inherent component of the semantics of the construction.

Further motivation for such an extension from the circumstantial to the quantificational meaning comes from the fact that the “verbal” *zere-...-ew* construction is a basis for two more lexicalized expressions of holistic quantification in Adyghe, viz. *zere-š’ə-t-ew* lit. ‘as it stands’ and *zere-psaw-ew* lit. ‘as it is in its entirety’ (Vodoždokov (ed.) 1960: 1009), cf. (40) and (41):

- (40) *məjeq^wape jə-fjəlar^wen^wjəje je-b-βepše-n*
 Maykop POSS-philharmony DAT-2SG.A-compare-POT
stambwəl zere.š’ə.t.ew wəne de-t-ep.
 Istanbul completely house LOC-stand-NEG
 ‘In the whole Istanbul there is no building comparable to the Maykop Philharmonic.’¹⁰

- (37) *we wə-n-jə-t^wə-r g^wəfabe-m jə-β^wənž-ew,*
 you(SG) 2SG.PR-eye-LNK-two-ABS love-OBL POSS-mirror-ADV
zere.psaw.ew dwənajə-r q-a-r-e-š’ə!
 completely world-ABS DIR-3PL.IO-LOC-DYN-reflect
 ‘Your eyes are a mirror of love, the whole world is reflected in them!’ (a popular song)¹¹

⁸ <http://www.adygvoice.ru/newsview.php?uid=3492>

⁹ <http://www.elot.ru/forum/viewtopic.php?t=4861&view=previous&sid=38a077ed0554df801691f41f4f406abd>

¹⁰ <http://www.adygvoice.ru/newsview.php?uid=1828>

¹¹ <http://www.youtube.com/watch?gl=US&feature=related&hl=iw&v=s8XtlBq1M5s>

☞ A somewhat comparable semantic extension seems to be attested in Karitiana (Tupí, Brazil), where the adjoined relativized verbal form *akatyym* lit. ‘those who are there’ is used as a universal quantifier (Coutinho-Silva & Quadros Gomes 2010). A similar process is probably underway in Paraguayan Guaraní (Gerasimov 2011).

5. Conclusions

The Adyghe *zere...-ew* holistic quantification construction is peculiar in the following respects:

- it is a highly grammaticalized morphological expression of a meaning for which it is typologically normal to be conveyed by lexical means;
- it involves “recategorization” of the quantified nominal expression as a secondary predicate or a depictive adverbial;
- its diachronic origins, though not entirely clear, have to do with temporal adjunct clauses, which, again, does not seem typical for expressions of universal quantification.

Abbreviations

A – agent, ABS – absolutive, ADD – additive suffix, ADV – adverbial, ANT – anterior, AUX – auxiliary suffix, BEN – benefactive preverb, CAUS – causative, COM – comitative preverb, DAT – dative preverb, DIR – directional preverb, DYN – dynamic, FUT – future, HOL – holistic, IO – indirect object, LNK – linking morpheme, LOC – locative preverb, MNR – manner subordination, NEG – negation, OBL – oblique, PL – plural, POSS – possessive preverb, POT – potential, PR – possessor, PST – past, RE – refactive/reversive, REC – reciprocal, SG – singular, TEMP – temporal subordination, TR – transitivity

References

- Arkadiev, Peter M. & Dmitry V. Gerasimov (2009). From instrument to manner to tense-aspect: A diachronic scenario from Adyghe. Talk presented at the 42nd Annual Meeting of Societas Linguistica Europaea, Lisbon, 9–12 September 2009.
- Arkadiev, Peter M., Alexander B. Letuchiy, Yury A. Lander, Nina R. Sumbatova & Yakov G. Testelets (2009). Vvedenie: Osnovnye svedeniya ob adygejskom jazyke. [Introduction: Basic facts about Adyghe.] In: Y. G. Testelets (ed.), *Aspekty polisintetizma: Očerki po grammatike adygejskogo jazyka*. [Aspects of Polysynthesis: Studies in the Grammar of Adyghe.] Moscow: RGGU, 17–120.
- Coutinho-Silva, Thiago & Ana Quadros Gomes (2010). The universal distributive quantifier construction in Karitiana. Paper presented at the VIII Workshop on Formal Linguistics, São Paulo.
- Gerasimov, Dmitry V. (2011). Remarks on universal quantification in Paraguayan Guaraní. Ms., Institute of Linguistic Studies, St.Petersburg, 2011.
- Gerasimov, Dmitry V. & Peter M. Arkadiev (2007). A peculiar resultative in Adyghe and what it can tell about aspectual composition in the language. Talk presented at the Conference on the Languages of the Caucasus, Leipzig, 7–9 December 2007.
- Haspelmath, Martin (1995). Diachronic sources of “all” and “every”. In: E. Bach, E. Jelinek, A. Kratzer & B.H. Partee (eds), *Quantification in natural languages. Vol. 1*. Dordrecht: Kluwer, 363–382.
- Lander Yury A. & Yakov G. Testelets (2006). Nouniness and specificity: Circassian and Wakashan. Paper presented at the conference *Universals and Particulars in Parts-of-Speech Systems*, Amsterdam.
- Landman, Fred (1998). Plurals and maximalization. In: S. Rothstein (ed.), *Events and Grammar*. Dordrecht: Kluwer, 237–271.
- Moltmann, Friederike (2005). Part structures in situations: The semantics of *individual* and *whole*. *Linguistics and Philosophy* 28, 599–641.
- Nikolaeva, Liudmila (2011). Quantifiers in Adyghe. Ms., MIT, 2011.
- Vodoždokov, Xadžemet (ed.) (1960). *Russko-adygejskij slovar'*. [The Russian-Adyghe Dictionary.] Moscow: Gosudarstvennoe izdatel'stvo inostrannyx i nacional'nyx slovarej.
- Vydrin, Arseniy P. (2008). Are there depictives in Adyghe? In: Chr. Schroede, G. Hentschel, W. Boeder (eds.), *Secondary Predicates in Eastern European Languages and Beyond*. Oldenburg: BIS-Verlag der Carl von Ossietzky-Universität, 423–445.