Raising, control and case

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Abstract. The paper presents raising and control phenomena in Khwarshi (Tsezic/Northeast Caucasian). Despite the fact that all the arguments of nonfinite clauses, including subjects, can be locally case-licensed, Khwarshi possesses both (forward) raising and (forward) control configurations. Khwarshi raising and control differ with respect to standard diagnostics including argument structure of the matrix predicate, argument selection, interpretation of subject idioms and scope options. Moreover, control appears to be more restricted than raising: only subjects can be controlled but both subjects and objects can raise. The paper discusses theoretical implications of the findings and contributes to expanding the scope of raising and control by introducing data from a less-studied language.

Keywords. raising; control; case; ergativity; Khwarshi

1. Introduction. The dichotomy of raising and control has a long history in generative syntax (see Davies & Dubinsky 2004 for historical background and Polinsky 2013 for minimalist advances). Starting with the insightful works of Rosenbaum (1967) and Postal (1970, 1974), formal linguistics draws a distinction between these superficially similar constructions, illustrated by English (1).

(1)   a.   Mary seems to know everything.
        b.   Mary wants to know everything.

It is claimed that (1a) and (1b) are structurally different. In the raising configuration (1a), the DP *Mary* originates in the theta-position of the embedded clause and then moves successively to the subject position of the main clause in order to be case-licensed. In the control configuration (1b), the DP *Mary* originates in the theta-position of the main clause and is linked to the empty category, PRO, in the subject position of the embedded clause by a special control relation. In both cases, the embedded subject position is caseless, which prevents overt DPs from appearing there; this position can only host PRO or an A-trace.[1]

At the turn of the century, a novel approach unifying raising and control as movement phenomena was proposed (Hornstein 1999, 2001, 2003; Boeckx & Hornstein 2003, 2004; Hornstein & Polinsky 2010). With the minimalist framework eliminating the distinction between deep and surface structures, it became possible for a DP to move to a theta-position and acquire more than one theta-role. Consequently, this opened up the possibility of analyzing the obligatorily controlled PRO (OC PRO) as a result of A-movement to a theta-position. The movement theory of

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[1] The elaborate model of obligatory control by Landau (2015) treats PRO as a minimal pronoun triggering λ-abstraction, and the emerging predicate is then linked via predication to either the matrix controller (predicational control) or to *pro* projected by perspectival C (logophoric control). This model can accommodate finite control, whereby PRO is in the finite subject position (Landau 2024).

control (MTC) made it possible to get rid of the cumbersome control module of GB, derive the minimal distance principle (MDP) from the general locality constraints on movement and provide a principled explanation to hitherto enigmatic phenomena such as backward control and copy control (Polinsky & Potsdam 2002, 2006).

The important premise which MTC relies on is that raising and control generally involve the same structural positions, namely, subject positions of nonfinite clauses. If both raising and control are driven by the need of the relevant DP to be case-licensed, the generalization that PRO appears in the positions where A-trace can appear follows automatically. However, recent studies reveal that in some languages, case-licensing might not be the driving force of raising and control (Polinsky & Potsdam 2002, 2006; Haddad 2011; Potsdam & Polinsky 2012; Longenbaugh & Polinsky 2018). In Tsez, Adyghe, Arabic and Niuean, all arguments of the relevant embedded clause can be case-licensed in their own clause; nonetheless, some of them participate in raising or control constructions.

In this paper, I discuss raising and control phenomena in Khwarshi, a Northeast Caucasian language. Khwarshi belongs to this very peculiar class of languages where all the arguments of nonfinite clauses, including subjects, can be locally licensed. At the same time, Khwarshi possesses both (forward) raising and (forward) control configurations. This combination of properties allows us to identify restrictions on raising and control untethered from case-licensing and to verify whether the generalization regarding the identical distribution of PRO and A-traces holds.

The rest of the paper is organized as follows. In section 2, I introduce basic data on Khwarshi. In section 3, I present the raising-like and control-like phenomena of Khwarshi and compare them with each other and with case-driven raising and control in more familiar languages. Section 4 summarizes the findings and discusses the implications for the formal theory of raising and control.

2. Khwarshi: basic data. Khwarshi is a Northeast Caucasian language of the Tsezic group spoken in Tsumada district, Republic of Daghestan (Russian Federation); the estimated number of speakers is about 8500 (Khalilova 2009: 3). Five dialects of Khwarshi can be distinguished; there is a detailed grammatical description for the Inkhokwari dialect (Khalilova 2009) and several grammatical sketches of Khwarshi proper, spoken in the villages of Khwarshi and Khonokh (Šarafutdinova & Levina 1961; Khalilova & Testelets to appear). This paper is based on my fieldwork on Khwarshi proper conducted in Khonokh in 2019 and 2022. In what follows, the label Khwarshi refers specifically to Khonokh Khwarshi.

Khwarshi is a head-final, morphologically ergative language that exhibits nominal class and number agreement in both nominal and verbal domains. The transitive subject appears in the ergative (2); the intransitive subject and transitive object are absolutive (2)–(3). The predicate invariably agrees with its absolutive argument.[2]

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[2] Abbreviations: I-VI – nominal class; ABL – ablative; ABS – absolutive; ADD – additive; ADV – adverbializer; AOR – aorist; AUX – auxiliary; CAUS – causative; CND – conditional; CONT – localization "cont"; COP – copula; CVB – converb; DAT – dative; ERG – ergative; FOC – focus particle; FUT – future; GEN1 – direct genitive; GEN2 – oblique genitive; GNT – general tense; HORT – hortative; HPL – human plural class; INF – infinitive; INTER – localization "inter"; INTS – intensifier; IPFV – imperfective; LAT – lative; NEG – negation; NHPL – non-human plural class; NML – nominalizer; OBL – oblique stem; PFV – perfective; PL – plural; POSS – localization "poss"; POT – potentialis; PRS – present tense; PTCP – participle; QU – question particle; QUOT – quotative marker; RECIPR – reciprocal pronoun; SUB – localization "sub"; SUP – localization "super".

(2) pat'imat-i   dija   telefon   l-ajsa.
     Patimat-ERG   I.GEN1   phone(IV)[ABS]   IV-take.AOR
     'Patimat took my phone.'

(3) a. išu   j-išša.   b. išu   j-ajda.
         mother(II)[ABS]   II-die.AOR   mother(II)[ABS]   II-work.AOR
         'Mother died.'   'Mother worked.'
     c. išu   rasul-e-ł   j-oχχa.
         mother(II)[ABS]   Rasul-OBL-INTER   II-get_mad.AOR
         'Mother got mad at Rasul.'

Affective and modal verbs project clauses with oblique experiencer subjects and absolutive stim-
uli (4a-d). The experiencer is dative with perception verbs (4a), psych verbs and modal verbs
(4b). Possessive[3] is used to encode nonvolitional agents (4c) and temporary possessors in posses-
sive predicative constructions (4d).

(4) a. isi   ustar-e-l   begawul-e-s   mihi   l-akʷa-na.
         this.OBL   craftsman-OBL-DAT   elder-OBL-GEN1   tail(IV)[ABS]   IV-see-CVB.PFV
         'The craftsman saw the elder's tail.'   (Walls have ears, 15)[4]
     b. di-l   debo   os   q'uča-na   gobč'i.
         I.OBL-DAT   you.GEN1   money(IV)[ABS]   need-CVB.PFV   COP.NEG
         'I don't need your money.'   (The blacksmith's sons, 36)
     c. iša-t'-qo   obu-t'e-s   lola   łuq'ida-na.
         mother-OBL-POSS   father-OBL-GEN1   leg(IV)[ABS]   hurt-CVB.PFV
         'Mother (accidentally) hurt father's leg.'
     d. di-qo   os   gobč'i   debe-l   iλ-a!
         I.OBL-POSS money(III)[ABS]   COP.NEG   you.OBL-DAT   give-INF
         'I don't have money to give you!'   (The blacksmith's sons, 35)

Khwarshi uses both finite and nonfinite strategies of clausal complementation. Finite comple-
ment clauses are introduced by the quotative enclitic complementizer -λλa(n) derived from the
verb iλa 'say'; -λλa(n) introduces not only indirect speech with verbs of saying, but also clausal
arguments of attitude verbs (5).

(5) [begawul-e-l   l-iq'e-łal,   is-i   (da)   iho-χ-a]-λλan
      elder-OBL-DAT   IV-know-CND   this(I)-ERG   I.(I)[ABS]   I.die-CAUS-FUT-QUOT
     ũλ-λo   eča-na   ustar.
     I.fear-CVB.IPFV   I.AUX-CVB.PFV   craftsman(I)[ABS]
     'The craftsman was afraid that the elder would learn (it) and kill him.'

                                                                    (Walls have ears, 25)

Nonfinite complement clauses are represented by nominalized, infinitival, participial and conver-
bial clauses (6). The matrix verb can select for one or several types of construction: thus, the
verb q'uča 'want' selects for infinitives, the verb -akʷa 'see' selects for nominalized or

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[3] The name of this case form should not mislead the reader: POSS is one of the six localizations available in
Khwarshi; it combines freely with directive affixes (e.g., -qo-l 'POSS-LAT', -qo-žo 'POSS-ABL' etc.) and has a primary
spatial meaning 'on the surface of smth'. Adnominal possessors appear in the genitive, not the possessive.
[4] Examples marked with text titles are from Khwarshi texts published in Karimova (2014) or collected by Yakov
Testelets during his fieldwork in Khonokh.

participial clauses and the verb *-iq'e* 'know' can take nominalized, participial or infinitival clauses as its complement.

(6) a. begawul-e-l   l-iq'e-na   [isa   bałgołi   l-iq'e-nu].
         elder-OBL-DAT IV-know-CVB.PFV this(I).GEN1   secret(IV)[ABS]   IV-know-NML
         'The elder understood that he had learnt the secret.'   (Walls have ears, 19)

    b. ħalt'uqan-e-l   [ãsé-l   kʷahałar   l-uw-a]   q'uča-ha
         servant-OBL-DAT   healer.OBL-DAT   evil(IV)[ABS] IV-do-INF want-CVB.IPFV
         l-eča-na.
         IV-AUX-CVB.PFV
         'The servant wanted to do evil to the healer.'   (Mullah and healer, 30)

    c. di-l   [deba   daci   q'uwat   gojła]   b-iq'-a
         I.OBL-DAT you.GEN1 how_much   force(III)[ABS] COP.PTCP III-know-INF
         q'uča-na.
         want-CVB.PFV
         'I want to know how strong you are.'   (The tale of the shepherd and the djinn, 24)

    d. di-l   [rasul-i   hĩše   c'alida-ha]   b-issa.
         I.OBL-DAT Rasul-ERG   book(III)[ABS] read-CVB.IPFV III-find.AOR
         'I found out that Rasul was reading a book.'

An important property of Khwarshi is that case assignment and predicate agreement are *v*P-bound: neither process depends on the finiteness of T. Thus, various types of nonfinite constituents embedding the verbal domain – e.g., nominalizations, infinitival and participial clauses – license the whole argument structure, including the external argument, and predicate agreement. Whenever an argument is projected by the verb, it can be assigned a dedicated case, and the verb always shows agreement (7a). Even if the argument is missing (e.g., corresponds to an empty category or receives alternative encoding in the nominal shell of the nominalization or in the matrix clause), its case licensing in the *v*P is revealed by agreeing floating quantifiers and intensifiers (7b), and if the absolutive is missing, it still controls agreement (7c). Therefore, it is impossible to tease apart theta-licensing and (syntactic) case-licensing of an argument in Khwarshi (but see Polinsky 2015 on Tsez, where the verbal projection in *-ni*-nominalizations can theta-mark the absolutive argument but cannot case-license it).

(7) a. di-l   q'uča-na   [mi   dija   l-iho:-χ-χa   hiban
         I.OBL-DAT want-CVB.PFV you.ERG   I.GEN1 IV-die-CAUS-PTCP thing(IV)[ABS]
         l-ec'id-a]!
         IV-compensate-INF
         'I want you to compensate my ruined goods!'   (The tale of the half-hen, 19)

    b. obu-t'e-l$_i$ [__$_i$ isi-č   hobodu uža   c'en-a]
         father-OBL-DAT   ERG self.I.ERG-INTS   this   boy(I)[ABS]   guard-INF
         q'uča-na   gołe.
         want-CVB.PFV   COP.PRS
         'The father wants to guard this boy himself.'

    c. beq-a-lo$_i$ [__$_i$ b-orλ'ida]-nu-qo-žu   idu
         sun(III)-OBL-GEN2 ABS(III) III-burn-NML-POSS-ABL   this(I)[ABS]
         aʁuda-ł-el   c'oχχa.
         sweat-CONT-LAT abound.AOR
         'Because the sun was bright he got sweaty.'

With this in mind, I proceed to a discussion of raising and control phenomena in Khwarshi.

3. Raising and control in Khwarshi. In this section, I present data on raising-like and control-like phenomena of Khwarshi. Raising to (absolutive) object seems to be available with matrix verbs -*isa* 'find out', *q'uča* 'want, need' and -*akʷa* 'see'; no raising to subject construction has been identified. Another process similar to raising is found in nominalizations, whereby an argument of the embedded verbal projection receives the adnominal (genitive) encoding. Control phenomena comprise both subject control (e.g., with the implicative verb -*eqʷa* 'manage, be able') and object control (e.g., with the causative verb -*ešt'a* 'let, cause'); besides, I argue that the Khwarshi biabsolutive construction is shaped as a control configuration.

3.1. RAISING. Let us begin the discussion by considering the three sentences (8a-c).

(8) a. šamil-e-l   [tušman-i   ʕaλ   b-oλalna
         Shamil-OBL-DAT   enemy-ERG   village(III)[ABS]   III-around
         b-uλ-eχ-na]   b-isa-na.
         III-gather-CAUS-CVB.PFV   III-find-CVB.PFV
         'Shamil found out that the enemy had surrounded the village.'

     b. šamil-e-l   tušmanᵢ   isa-na
         Shamil-OBL-DAT   enemy(I)[ABS]   I.find-CVB.PFV
         [__ᵢ   ʕaλ   b-oλalna   b-uλ-eχ-na].
          ERG   village(III)[ABS]   III-around   III-gather-CAUS-CVB.PFV
         'Shamil found the enemy having surrounded the village.'

     c. šamil-e-l   ʕaλᵢ   b-isa-na
         Shamil-OBL-DAT   village(III)[ABS]   III-find-CVB.PFV
         [tušman-i   __ᵢ   b-oλalna   b-uλ-eχ-na].
          enemy-ERG   ABS   III-around   III-gather-CAUS-CVB.PFV
         'Shamil found the village surrounded by the enemy.'

In (8a), the matrix verb -*isa* 'find out' takes two arguments: the nominal argument *šamilel* 'Shamil' and the clausal argument realized by the converbial clause. The embedded clause is transitive and both arguments are expressed overtly. The embedded absolutive (class III) controls predicate agreement in both clauses.

    In (8b), the subject of the embedded clause raises into the matrix clause. It receives absolutive instead of ergative case marking, becomes a controller of the matrix predicate agreement (class I) and is now separated from the embedded clause by the material of the matrix clause.

    In (8c), the object of the embedded clause seems to be raising to the matrix clause. It remains absolutive and controls the predicate agreement as in (8a), but is now located within the matrix clause. We can suppose that it is in the same position as the raised nominal *tušman* 'enemy' in (8b), namely, the position of the matrix absolutive, and as such, it agrees with the matrix verb.

    Since neither case marking nor matrix predicate agreement changes when the absolutive argument raises in (8c), it is crucial to exclude the analytical alternative of long-distance scrambling. The evidence for the raising analysis of (8c) is twofold. On the one hand, long-distance scrambling is severely restricted in Khwarshi; (9) shows that the ergative subject cannot be scrambled to the matrix clause.

(9) *šamil-e-l   tušman-iᵢ   b-isa-na
     Shamil-OBL-DAT   enemy-ERG   III-find-CVB.PFV
     [__ᵢ   ʕaλ   b-oλalna   b-uλ-eχ-na].
       ERG   village(III)[ABS]   III-around III-gather-CAUS-CVB.PFV
     Intended: 'Shamil found the enemy having surrounded the village.'

On the other hand, raised absolutives differ from embedded absolutives with regard to a number
of diagnostics sensitive to the structural position of the nominal. Raised absolutives can bind
(non-subject-oriented) anaphors in the matrix clause, out-scope the matrix subject and be locally
bound by the matrix subject (see the application of the latter diagnostic in (10)).

(10) a. šamil-e-lᵢ   žu-čᵢ   isa-na
         Shamil-OBL-DAT   self(I)[ABS]-INTS   I.find-CVB.PFV
         [tušman-i   __ᵢ   oλalna   uλ-eχ-na].
          enemy-ERG   ABS   I.around   I.gather-CAUS-CVB.PFV
         'Shamil found himself surrounded by the enemy.'
      b. šamil-e-lⱼ   [tušman-iᵢ   žu-čᵢ,*ⱼ   oλalna
         Shamil-OBL-DAT   enemy-ERG   self(I)[ABS]-INTS   I.around
         uλ-eχ-na]   isa-na.
         I.gather-CAUS-CVB.PFV   I.find-CVB.PFV
         'Shamilⱼ found out that the enemyᵢ had surrounded himselfᵢ/*himⱼ.'

Given this evidence, I conclude that absolutive objects raise to the matrix clause rather than be-
ing scrambled there.

     Similar constructions are attested with matrix verbs *q'uča* 'want, need' and *-akʷa* 'see' – the
only difference being that *q'uča* 'want, need' attests raising out of the infinitival clause and *-akʷa*
'see' exhibits raising out of the participial clause.[5]

     Let us ensure that we are dealing here with a raising configuration.

     First of all, raising as an A-dependency must obey locality restrictions. This is indeed the
case in Khwarshi: comparing (11) and (12) shows that raising can only cross one (nonfinite)
clause boundary, and hyperraising (12b) is ungrammatical.

(11) a. di-l   [iša-t'-i   rasul   ecic-na]   issa.
         I.OBL-DAT mother-OBL-ERG Rasul(I)[ABS] I.praise-CVB.PFV I.find.AOR
         'I found out that mother praised Rasul.'
      b. di-l   rasulⱼ   issa   [iša-t'-i   __ⱼ   ecic-na].
         I.OBL-DAT Rasul(I)[ABS] I.find.AOR mother-OBL-ERG ABS   I.praise-CVB.PFV
         'I found Rasul being praised by mother.'

(12) a. di-l   [obu-t'e-l   [iša-t'-i   rasul   eci:c-ca]
         I.OBL-DAT father-OBL-DAT   mother-OBL-ERG Rasul(I)[ABS] I.praise-PTCP
         l-iq'e-na]   l-issa.
         IV-know-CVB.PFV   IV-find.AOR
         'I found out that father learnt that mother praised Rasul.'

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[5] The bi-clausality of the constructions in question is supported by the fact that clause-level operators such as nega-
tion and event modification can apply in the main and embedded clauses independently. I skip the relevant examples
for reasons of space.

b. *di-l   rasul_j   issa   [obu-t'e-l   [iša-t'-i

b. *di-l   rasul$_j$ issa   [obu-t'e-l   [iša-t'-i
   I.OBL-DAT Rasul(I)[ABS] I.find.AOR father-OBL-DAT   mother-OBL-ERG

   __$_j$ eci:c-ca]   l-iq'e-na].
   ABS   I.praise-PTCP   IV-know-CVB.PFV

   Intended: 'I found out about Rasul that father learnt that mother praised him.'

The next thing to observe is that raising is not obligatory: the matrix verb can lack an absolutive nominal argument altogether (cf. (8a), (11a), and (12a)). This property is Khwarshi's mirror image of the availability of expletive subjects with raising-to-subject verbs in English (13).

(13) a. It seems (to John) that Mary is a genius.
      b. Mary seems (to John) to be a genius.

Another property of raising is that it does not disrupt idiomatic readings. This diagnostic successfully applies to Khwarshi raising constructions. Let us consider the subject-predicate idiom in (14a), meaning literally 'the devil jumped between smb'. (14b) shows that its idiomatic meaning is preserved under raising.

(14) a. hamaʁe-za-lo   b-oλa-λ'o-l   šajt'an   k'oλa-na   goɫe.
          friend-OBL.PL-GEN2   III-between-SUP-LAT   devil(III)[ABS] jump-CVB.PFV COP.PRS
          'The friends quarreled.' (lit.: The devil jumped between the friends)
      b. di-l   šajt'an$_i$ b-issa   [hamaʁe-za-lo   b-oλa-λ'o-l
          I.OBL-DAT devil(III)[ABS] III-find.AOR   friend-OBL.PL-GEN2   III-between-SUP-LAT

          __$_i$ k'oλa-na].
          ABS   jump-CVB.PFV
          'I found out that the friends had quarreled.'

Finally, let us confirm that the raised nominal reconstructs for binding and scope. As we have already seen in (10), the simplex reflexive *žuč* consisting of the pronoun *žu* and the intensifier *-č* can only be bound by a local c-commanding subject (Testelets 2019: 83–85). Therefore, the grammaticality of (15b) shows that the absolutive *pat'imat* 'Patimat' has a copy in the subject position of the embedded clause.

(15) a. aminat-e-l   q'uča-na   [pat'imat-i   žu-č
          Aminat-OBL-DAT want-CVB.PFV   Patimat-ERG   self(II)[ABS]-INTS
          j-ũq'a-χ-a].
          II-recover-CAUS-INF
          'Aminat$_i$ wants Patimat$_j$ to cure herself$_{j/*i}$.'
      b. aminat-e-l   pat'imat$_i$ q'uča-na   [__$_i$ žu-č
          Aminat-OBL-DAT Patimat(II)[ABS]   want-CVB.PFV   ERG   self(II)[ABS]-INTS
          j-ũq'a-χ-a].
          II-recover-CAUS-INF
          'Aminat wants Patimat to cure herself.'

Quantifier raising is clause-bound in Khwarshi. Thus, (16a) has both surface and inverse scope readings due to QR, but in (16b) the universal quantifier in the embedded clause cannot outscope the same nominal in the matrix clause.

(16) a. q'ʷa-na   užá   žibžib kand-e-l   kumak   b-u-na   goɫe.
       two-OBL   boy.ERG   every girl-OBL-DAT   help(III)[ABS] III-do-CVB.PFV COP.PRS
       'Two boys helped every girl.'
       surface scope: two > every; inverse scope: every > two

    b. q'ʷa-na   užá-l   q'uča-na   [de   žibžib kand-e-l   kumak
       two-OBL   boy.OBL-DAT   want-CVB.PFV I.ERG every girl-OBL-DAT   help(III)[ABS]
       b-uw-a].
       III-do-INF
       'Two boys want me to help every girl.'
       surface scope: two > every; *inverse scope: every > two

In (17), both scope readings are readily available. Since the inverse scope reading cannot result
from QR of *every girl* to the matrix clause, I conclude that *two boys* can reconstruct for scope in
the embedded clause.

(17) di-l   q'uni úžaᵢ   q'uča-na   [__ᵢ žibžib kand-e-l
     I.OBL-DAT two   boy(I)[ABS]   want-CVB.PFV   ERG every girl-OBL-DAT
     kumak   b-uw-a].
     help(III)[ABS] III-do-INF
     'I need two boys to help every girl.'
     without reconstruction: two > every; reconstruction: every > two

To sum up, the evidence presented all supports the claim that we are dealing with a raising con-
struction. Now let us address another important issue: which argument of the embedded clause
can raise, and which cannot.

    In English, only one argument of the embedded nonfinite clause can undergo raising. This is
because only one argument, namely the subject, is not licensed in the embedded clause and needs
to establish an *Agree* relation with the external functional structure. In Khwarshi, however, all
arguments can be licensed *v*P-internally, to the effect that the subject does not differ from other
argumental DPs with respect to its need for case. However, it may still be the highest argument
of the embedded clause, so that the *Attract Closest* principle would block raising of lower argu-
ments.

    It turns out that there are two principles constraining raising in Khwarshi. First, only core
arguments can raise. Secondly, this pool is further restricted to three cases, namely absolutive,
ergative, and dative. As a result, the list of arguments undergoing raising is limited to absolutive
subject, absolutive object, ergative subject and dative subject. It is worth emphasizing that dative
indirect objects (e.g., recipients), possessive subjects (e.g., nonvolitional agents) and dative/ er-
gative adjuncts (e.g., instruments or time spans) are not eligible for raising.

    In Lyutikova (2022), it is suggested that the observed distinction results from the structural
representation of case morphology in Khwarshi: syntactically, case forms of nominals can corre-
spond to either a formal feature of the DP or a PP with a phonologically empty P. This proposal
develops the insightful hypothesis put forward in Polinsky (2016) that the DP/PP dichotomy de-
termines the behavior of ergative subjects and ultimately underlies syntactic ergativity. The
crucial difference between DP and PP arguments is that DPs are visible to ϕ-probes and can be
attracted, whereas PPs are not: either the DP's ϕ-features are buried within the PP shell, hence
invisible to the probe, or the DP cannot be sub-extracted out of the PP. In any case, PP-
arguments are frozen in their positions and cannot move further.

This line of reasoning fits perfectly the case at hand: exactly those arguments that can be shown to be shaped as DPs[6] – absolute subject and object, ergative and dative subject –participate in the raising construction. Therefore, I conclude that Khwarshi raising is restricted to DPs, and hence exhibits another important property of A-dependencies.

What is peculiar in Khwarshi raising is that the subject and the object are equally eligible as goals. In (8b-c), this is shown for transitive embedded clauses; in (18a-b), the perception verb *-akʷa* 'see' projecting the dative subject is exemplified in a raising construction.

(18) a. χan-e-l ihó-s úža$_i$ isa-na
khan-OBL-DAT shepherd.OBL-GEN1 boy(I)[ABS] I.find-CVB.PFV
[__$_i$ isa kãd j-akʷa-na].
DAT self(I).GEN1 girl(II)[ABS] II-see-CVB.PFV
'The khan found out that the shepherd's son had seen his daughter.'

b. χan-e-l isa-č kãd$_i$ j-isa-na
khan-OBL-DAT self(I).GEN1-INTS girl(II)[ABS] II-find-CVB.PFV
[ihó-lo užá-l __$_i$ j-akʷa-na].
shepherd.OBL-GEN2 boy.OBL-DAT ABS II-see-CVB.PFV
'The khan found out that his daughter had been seen by the shepherd's son.'

Importantly, the subject is not an intervener for object extraction. I postpone the discussion of the apparent equidistance of subject and object until section 4; here, I would like to address interpretational effects of raising. It seems that the choice of an argument reflects its information-structural characteristics, such as perspective in the sense of Kuno (1987) and Smith (2002). While sentences without raising like (8a) provide a neutral description of the perceived situation, the raised argument constitutes the focus of attention of the perceiver, and the situation is described as though from a standpoint or physical location of this argument. In this respect, the choice of the raised argument is similar to the choice of active/passive voice in English (cf. Tomlin 1995). Indeed, (19) containing the Khwarshi idiom *to throw an ear on smth* (= 'to eavesdrop on smth') has low acceptability, as it presupposes presenting the situation from the point of view of a referentially dependent (or even nonreferential) entity. Similarly, anaphors licensed in the dependent clause are unlikely to raise (20).

(19) ⁇*di-l ãhi$_i$ l-isa-na
I.OBL-DAT ear(IV)[ABS] IV-find-CVB.PFV
[aminat-i il-lo χabar-qo-l __$_i$ kul-na].
Aminat-ERG we.OBL-GEN2 chat-POSS-LAT ABS throw-CVB.PFV
Intended: 'I found out that Aminat had eavesdropped on our chat.'

(20) ⁇*di-l hãdijas$_i$ q'uča-na
I.OBL-DAT RECIPR[ABS] want-CVB.PFV
[kand-i-n užá-n __$_i$ b-ełił-a].
girl.OBL-ERG-ADD boy.ERG-ADD ABS HPL-chase-INF
Intended: 'I want the girl and the boy to chase each other.'

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[6] In Lyutikova (2020, 2022), I propose the relevant diagnostic: since PPs can be further attributivized in Khwarshi in the nominal environment, those verbal arguments that allow attributivization under nominalization are PPs, and those which resist attributivization are DPs. This diagnostic systematically distinguishes core arguments in absolutive, ergative and dative from all other arguments and adjuncts.

As far as I can tell, Khwarshi lacks backward raising – a raising configuration where the higher copy in the matrix clause is given a null spellout and the lower copy in the embedded clause is overtly expressed (Potsdam & Polinsky 2012). Backward raising can be diagnosed based on the evidence that the matrix clause contains an empty category in the argument position. In Khwarshi, such configurations are absent. Indeed, in configurations like (8a), (11a), and (15a) where the raising-to-object verb appears to take only a clausal-internal argument, no evidence for a covert absolutive in the matrix clause can be found. The matrix verb invariably agrees with the embedded absolutive, which is a specific instance of long-distance agreement (see Chumakina & Lyutikova 2023 for more detail). Quantificational arguments of the embedded clause cannot out-scope those in the matrix clause. Anaphors in the matrix clause cannot be bound by any DP in the embedded clause. I conclude that backward raising to object is absent in Khwarshi. Similarly, no (backward) raising to subject is attested: unaccusative matrix verbs taking a clausal argument like *start* (intransitive), *be possible* or *be necessary* do not involve either forward or backward raising. They exhibit long-distance agreement with the embedded absolutive (21) and supply no evidence for a nominal empty category either in the matrix or in the embedded clause.[7]

(21) a. hada   zaman-a-λ'o   χan-o-ččo   ʁuruše-za-s   os
          one.OBL   time-OBL-SUP ceiling-OBL-SUB.ABL coin-OBL.PL-GEN1 money(III)[ABS]
          b-iš-a   b-eq-na.
          III-pour_intrans-INF   III-start-CVB.PFV
          'Once, money in coins began to pour down (on her) from the ceiling.'
                                                              (Ropewalker and marten, 14)
      b. di-l   ħaq'   iλ-a   b-ukko-ja   mi.
          I.OBL-DAT   fee(III)[ABS] give-INF   III-be_necessary-PTCP you.ERG
          'It is necessary that you pay me.'   (The blacksmith's sons, 34)

Thus, (forward) raising to object in Khwarshi is attested with a number of affective matrix verbs; it can affect a restricted pool of embedded arguments – absolutive subject and object, ergative and dative subject – and seems to disregard the *Attract Closest* principle.

Similar properties are exhibited by yet another syntactic operation in Khwarshi: genitive encoding of the arguments of nominalizations.

Nominalization in Khwarshi embeds enough syntactic structure to project and case-mark all verbal arguments; it also shows class-number predicate agreement with the absolutive whenever the verb does (22a). At the same time, the Khwarshi nominalization is a nominal constituent, and as such exhibits nominal grammatical categories (class, number, case) and allows adnominal modifiers (demonstratives, possessors, adjectives). Our point of interest is the possibility of possessive (i.e., genitive) marking of the arguments of the nominalization.

Khwarshi nominalization seems to impose no restrictions on the number of arguments receiving adnominal genitive case.[8] Moreover, possessive encoding is available for a structurally inferior argument in the presence of a c-commanding intervener. In (22b-c), for instance, either of the core arguments of the nominalization may receive genitive case. For some native speakers,

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[7] Word order options in such configurations (cf. (21b)) suggest that they may involve restructuring.
[8] Yakov Testelets (p.c.) reports that his consultants generally reject examples where two or more arguments receive genitive encoding simultaneously. Presumably, the number of arguments bearing adnominal encoding in nominalizations is subject to variation. My tentative generalization is that those speakers who allow for two referential genitives with picture nouns (*Rasul's picture of Zaira*) are also liable to accept nominalizations with two genitive arguments.

genitive encoding does not involve any dislocation of the argument; others insist that genitive arguments should be located outside the (extended) verbal projection embedded under the nominalizing morpheme. In (22b-c), I represent the latter option.

(22) a. di-l   l-ajka   [rasul-i   ʁaj   b-u-nu].
        I.OBL-DAT IV-see.AOR   Rasul-ERG house(III)[ABS]   III-make-NML[ABS]
        'I saw Rasul building the house.'
     b. di-l   l-ajka   rasul-e-s$_i$ [__$_i$ ʁaj   b-u-nu].
        I.OBL-DAT IV-see.AOR Rasul-OBL-GEN1   ERG   house(III)[ABS]III-make-NML[ABS]
        'I saw Rasul's building of the house.'
     c. di-l   l-ajka   ʁaj-e-s$_i$ [rasul-i   __$_i$ b-u-nu].
        I.OBL-DAT IV-see.AOR house-OBL-GEN1   Rasul-ERG   ABS   III-make-NML[ABS]
        'I saw the house's building by Rasul.'

In Lyutikova (2022), I suggest that genitive encoding of the nominalization's arguments should be construed as raising: the raised argument receives genitive case from the nominal functional structure dominating the nominalized clause. This analysis is further supported by the following facts. First, the form of the adnominal genitive is sensitive to the case of the embedding nominal: the direct genitive, or genitive1, modifies absolutive nominals, whereas the oblique genitive, or genitive2, modifies oblique nominals. This opposition is found with genitive arguments of nominalizations as well. In (22b-c), the nominalization itself is absolutive, and the direct genitive form is attested. In (23), the nominalization is in an oblique case, and the oblique genitive is used accordingly.

(23) ĩdu   gojɬaja-b   ħalt'uqan-ba   giɬ-žu-n   qʷaqʷaλa-na,   gic'a-na
     home   all-HPL   servant-PL[ABS]   down-ABL-ADD   laugh-CVB.PFV   look-CVB.PFV
     b-eča-na   ãsé-lo$_i$ [__$_i$ tamašaja-b   dáru
     HPL-AUX-CVB.PFV healer.OBL-GEN2   ERG   wonderful-III   medicine(III)[ABS]
     b-u-nu]-qo-l.
     III-make-NML-POSS-LAT
     'All the servants in the house looked laughing at the healer's preparing the wonderful
     medicine.'   (Mullah and healer, 18)

Secondly, genitive encoding of the nominalization's argument precludes the long-distance agreement of the matrix predicate. If the nominalization is in the absolutive position of the matrix predicate, the latter can either agree with the nominalization's absolutive (long-distance agreement) or show 4th class (i.e., default) agreement (cf. (24a)). However, if one of the arguments receives genitive case, the only option available is 4th class agreement on the matrix predicate (24b).

(24) a. di-l   l-ajka   ‖ b-ajka   [rasul-i   ʁaj   b-u-nu].
        I.OBL-DAT IV-see.AOR ‖ III-see.AOR   Rasul-ERG house(III)[ABS]III-make-NML[ABS]
        'I saw Rasul building the house.'
     b. di-l   l-ajka   ‖*b-ajka   rasul-e-s$_i$
        I.OBL-DAT IV-see.AOR ‖ III-see.AOR   Rasul-OBL-GEN1
        [__$_i$ ʁaj   b-u-nu].
         ERG   house(III)[ABS]   III-make-NML[ABS]
        'I saw Rasul's building of the house.'

I suggest that the nominal functional structure providing adnominal genitive encoding for the nominalization's argument in (24b) is what makes the nominalization opaque to agreement probes and ultimately blocks long-distance agreement. By contrast, (24a) is compatible with two structural analyses: as a bare extended projection of the verb or as the same projection embedded under a nominal functional shell.[9] The former structure allows for long-distance agreement whereas the latter forces default agreement on the matrix verb.

Therefore I conclude that case alternations in Khwarshi nominalizations represent another raising phenomenon. As expected, the diagnostics of raising support this analysis. (25a) shows that nominal arguments belonging to idioms can be genitive-marked under nominalization; (25b) confirms that raised nominals can have narrow scope with respect to embedded negation.

(25) a. ini,   ut't'e-j-la ĩsa-lo$_i$ [__$_i$ j-iχ^{w}a-nu]-qo!
          look.HORT red-V-OBL snow-GEN2   ABS   V-snow-NML-POSS
          'Look, a miracle is happening!' (lit. It is snowing red snow)

      b. di-l   l-i:q'e   žibžib užá-s$_i$
          I.OBL-DAT IV-know.GNT every   boy.OBL-GEN1
          [__$_i$ a<b>du   hĩše   c'alida-tte-nu].
            ERG   this<III>   book(III)[ABS] read-NEG-NML
          'I know that every boy didn't read this book.'
          surface scope: every > neg; reconstruction: neg > every

This concludes my presentation of raising phenomena in Khwarshi. In the next section, I present control configurations.

3.2. CONTROL. Let us begin the discussion of control configurations with examples (26a) and (26b), displaying the implicative predicate -eq^{w}a 'manage, be able'.

(26) a. amma hoboža   gic'a-ha   [deb-qo   [ʁur-a-ššo
          but   now   look-CVB.IPFV you.OBL-POSS stone-OBL-INTER.ABL
          ła   l-oλa-k'-a]   l-e:q^{w}a-q'e].
          water(IV)[ABS]   IV-appear-CAUS-INF IV-manage.GNT-QU
          'But now we'll see if you are able to squeeze water out of the stone.'
                                        (The tale of the shepherd and the djinn, 35)

      b. hãdi-n   insan-qo [žu   ũq'a-χ-a]   eq-na
          one.OBL-ADD man-POSS this(I)[ABS] I.recover-CAUS-INF I.manage-CVB.PFV
          gobč'i.
          COP.NEG
          'Not one man managed to cure him.'   (Mullah and healer, 8)

We see that the matrix verb has two arguments: a possessive nominal argument and an infinitival clausal argument. In the absence of its own absolutive, the matrix verb agrees with the absolutive of the infinitive. The infinitival clause lacks an overt subject; indeed, it turns out to be impossible to make it overt; cf. (27). This fact is especially indicative since infinitives can project and case-mark overt subjects in Khwarshi; cf. (15a) and (16b).

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[9] A similar analysis has recently been proposed for Udmurt nominalizations/participles (Dékány & Georgieva 2020): the authors treat the suffix -m shared by nominalizations and participles not as a nominalizing head, but as a head of the extended verbal projection. This makes it possible to explain why participial clauses attest a nominative subject but nominalizations mark it with genitive case.

(27) *hãdi-n   insan-qo [ãsé   žu   ũq'a-χ-a]
     one.OBL-ADD man-POSS healer.ERG   this(I)[ABS] I.recover-CAUS-INF
     eq-na   gobč'i.
     I.manage-CVB.PFV   COP.NEG
     Intended: 'Not one man managed to have the healer cure him.'

Importantly, the empty category in the subject position has case, which can be retrieved by examining the case of the relevant floating quantifier or intensifier (28).

(28) ihó-lo   užá-qo   [isi-č   ʁur-a-ššo
     shepherd.OBL-GEN2   boy.OBL-POSS   self(I).ERG-INTS   stone-OBL-INTER.ABL
     ła   l-oλa-k'-a]   l-eq-na.
     water(IV)[ABS]   IV-appear-CAUS-INF   IV-manage-CVB.PFV
     'The shepherd's son managed PRO_i to squeeze water out of the stone himself_i.'

Therefore, I conclude that in (26), the infinitival clauses possess an empty category in the subject position that is coindexed with the matrix oblique subject.

     Another example of the same type is provided by complementation constructions with the causative verb *-ešt'a* 'let, cause' (29). This verb takes two nominal arguments, the causer, which is ergative, and the causee, which is absolutive, and one clausal argument, which is headed by the infinitive. *-ešt'a* 'let, cause' agrees with its own absolutive argument.

(29) a. (idižid-i) žu   [b-eχola t'ero-ho   birgadir-łana ad-a]   ešt'a-na.
        they-ERG   this(I)[ABS] III-long bridge-AD foreman-ADV   I.work-INF I.let-CVB.PFV
        'They made him work on the long bridge as a foreman.'   (Resettlement, 15)
     b. ec'nu ho:jca   begawul-i [hãdi   isu-l-ebč'a   šiλ'u
        new   elect.PTCP elder-ERG   one.OBL   this.OBL-DAT-FOC clothing(IV)[ABS]
        n-aqʷ-a]   ešt'a-ha   eča-na   gobč'i   idu   žík'ʷa.
        IV-sew-INF   I.let-CVB.IPFV   I.AUX-CVB.PFV   COP.NEG   this   man(I)[ABS]
        'The newly elected elder allowed him (the craftsman) only to sew the clothes for him
        (the elder) alone.'   (Walls have ears, 4)

Just as in the previous case, the infinitive's subject is not overtly expressed and cannot be expressed by an overt nominal, but its case is manifested by agreeing floating quantifiers and intensifiers. The only difference is that the infinitive's subject is referentially dependent on the absolutive object, and not the subject, of the matrix verb. In what follows, I show that the relation between the relevant nominal argument of the matrix verb and the empty category in the subject position of the infinitival clause is that of control. In other words, *-eqʷa* 'manage, be able' is a subject control verb whereas *-ešt'a* 'let, cause' is an object control verb.[10] In the remainder of this section, I use the label PRO as shorthand for the obligatorily empty category found in the control configuration; I postpone the discussion of its nature until section 4.

     First of all, the relation between the matrix DP and PRO is local: no intermediate clause can occur between the matrix and the embedded control clause. However, one control configuration can be embedded under another one, as in (30).

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[10] Again, the bi-clausality of the relevant constructions can be confirmed by the independent application of negation and event modification to the embedded or matrix eventuality.

(30) di-qoᵢ   [PROᵢ rasulⱼ   [PROⱼ kand-e-l   kumak   b-uw-a]
I.OBL-POSS ERG   Rasul(I)[ABS]   ERG   girl-OBL-DAT   help(III)[ABS]   III-do-INF
ešt'-a]   eqqa.
I.let-INF   I.manage.AOR
'I managed to make Rasul help the girl.'

The nominal argument of the control verb is selected by the verb, hence obligatory; if it is missing, it is interpreted as *pro* and continues to control the reference of PRO:

(31) begawul-i *proᵢ*   [PROᵢ isu-l   šiƛ'u   n-aqʷ-a]   ešit't'a.
elder-ERG ABS   ERG   this.OBL-DAT clothing(IV)[ABS] IV-sew-INF   I.let.AOR
'The elder made someone sew the clothing for him.'

Subject idioms lose their idiomatic reading in the control environment; cf. (32).

(32) a. *ut't'e-j-la ĩsa-qoᵢ   [PROᵢ j-iχʷ-a]   j-eq-na   gołe!
red-V-OBL snow-POSS ABS   V-snow-INF   V-manage-CVB.PFV   COP.PRS
Intended: 'A miracle managed to happen!' (lit. Red snow managed to snow)

b. *de   rasul-e-s   semiᵢ   [PROᵢ m-ak'-a]   b-ešit't'a.
I.ERG Rasul-OBL-GEN1 bile(III)[ABS]   ABS   III-go-INF III-let.AOR
Intended: 'I made Rasul get angry.' (lit. I made Rasul's bile go)

Finally, the controlling argument of the matrix clause cannot take narrow scope with respect to embedded DPs or event modifiers.

(33) a. q'ʷa-na   užá-qoᵢ   [PROᵢ žibžib kand-e-l   kumak   b-uw-a]
two-OBL   boy.OBL-POSS ERG   every   girl-OBL-DAT   help(III)[ABS]   III-do-INF
b-eq-na.
III-manage-CVB.PFV
'Two boys managed to help every girl.'
surface scope: two > every; *inverse scope: every > two

b. de   q'uni úžaᵢ   [PROᵢ hibalan   ĩdu   ƛiχʷ-a]   ešit't'a.
I.ERG two   boy(I)[ABS]   ABS   always   home   stay-INF   I.let.AOR
'I made two boys always stay home.'
surface scope: two > always; *inverse scope: always > two

The most controversial issue concerns restrictions on the distribution of PRO in control configurations. Firstly, PRO can only appear in the subject position. This means that for every infinitival clause, only one structural position is available for PRO; cf. (34). Thus, control contrasts sharply with raising, which allows any of the core arguments to be eligible as a goal.

(34) a. di-qoᵢ   [PROᵢ toχtur-za-l   úža   akʷa-χ-a]   eqqa.
I.OBL-DAT ERG   doctor-OBL.PL-DAT   boy(I)[ABS]   I.see-CAUS-INF I.manage.AOR
'I managed to show (my) son to the doctors.'

b. *di-qoᵢ   [χol-i   toχtur-za-l   PROᵢ j-akʷa-χ-a]   j-eqqa.
I.OBL-DAT husband-ERG doctor-OBL.PL-DAT ABS   II-see-CAUS-INF II-manage.AOR
Intended: 'I managed to be shown to the doctors by (my) husband.'

c. *di-qoᵢ   [toχtur-za   PROᵢ úža   akʷa-χ-a]   eqqa.
I.OBL-DAT doctor-ERG.PL DAT   boy(I)[ABS]   I.see-CAUS-INF   I.manage.AOR
Intended: 'I managed to be shown (my) son by the doctors.'

Secondly, PRO is case-sensitive in much the same way as raising is: only absolutive, ergative and dative subjects can be replaced by PRO. Again, possessive subjects are excluded:

(35) *de   kãd_i   [PRO_i l-iq'-abču   ła   l-uč'-eł-a]
       I.ERG   girl(II)[ABS]   POSS IV-know-CVB.NEG water(IV)[ABS]   IV-spill-POT-INF
       j-ešit't'a.
       II-let.AOR
       Intended: 'I made (my) daughter accidentally (= not knowing) spill water.'

The exclusion of possessive subjects might be explained by saying that PRO is restricted to volitional subjects (as suggested by Gagliardi et al. 2014 for Tsez). However, this explanation cannot be maintained for Khwarshi, since absolutive or dative PRO is attested in clearly nonvolitional contexts; cf. (36).

(36) (žid-i)   žu   ila   išu_i   [PRO_i j-ih-a]   j-ešit't'a-λλa…
       they-ERG this   we.GEN1 mother(II)[ABS]   ABS   II-die-INF II-let.AOR-QUOT
       '… they (the relatives) let our mother die.'   (Our mother, 26)

At the same time, it turns out that inanimate ergative subjects, such as natural forces (which are not agents but effectors, unable to control the action), are excluded from control configurations, cf. (37).

(37) a. łihi   c'a   n-it'-eχ-χa.
          water.ERG fire(IV)[ABS]   IV-extinguish-CAUS-AOR
          'The water put out the fire.'   (Knock-knock, little rooster, 9)
      b.[?]*de   ła_i   [PRO_i c'a   n-it'-eχ-a]   l-ešit't'a.
          I.ERG   water(IV)[ABS] ERG   fire(IV)[ABS] IV-extinguish-CAUS-INF   IV-let.AOR
          Intended: 'I made the water put out the fire.'

I suggest that these facts should be treated as follows. On the one hand, there are structural restrictions on the distribution of PRO: it can only appear in the DP-subject position. This excludes all adjuncts, objects and PP-subjects. On the other hand, there is an animacy restriction on the argument in the control chain. This restriction cannot be reduced to volitionality of the embedded subject, since animate absolutive and dative subjects can be associated with nonvolitional events such as *die*, *grow old*, *love* or *hear*. I believe that this restriction should be attributed to the selection of the matrix control verb itself: when introducing a control configuration, matrix verbs like *-eq^wa* 'manage, be able' or *-ešt'a* 'let, cause' select for an animate argument.

To sum up, (forward) control in Khwarshi is represented by subject and object control constructions projected by a number of implicative and causative matrix verbs; the controllee is represented by the empty category (PRO) restricted to the DP-subject position of the infinitival clause. Backward control constructions seem to be absent in Khwarshi.

Another configuration relevant for control in Khwarshi is the biabsolutive construction. Khwarshi attests the biabsolutive construction in the context of analytic verb forms involving the imperfective converb. The biabsolutive construction is a regular modification of the transitive construction in which both core arguments appear in the absolutive case (Forker 2012; Gagliardi et al. 2014). An example of a minimal pair is provided in (38). (38a) is a standard transitive construction where the subject is ergative and the verbal predicate invariably agrees with the absolutive argument. (38b) attests a biabsolutive construction that is characterized by the following properties: first, the subject also appears in the absolutive; secondly, the auxiliary agrees with

the subject absolutive. The typical function of the biabsolutive construction is agent topicalization; biabsolutive clauses are often used as answers to questions about the agent's activity ('What is/was X doing?'), whereby the lower absolutive and the verb form the predicate focus.

(38) a. rasul-i ʁaj b-u-ho b-ejča ‖*ejča.
Rasul-ERG house(III)[ABS] III-make-CVB.IPFV III-AUX.AOR ‖ I.AUX.AOR
'Rasul was building a house.'

b. rasul ʁaj b-u-ho ejča ‖*b-ejča.
Rasul(I)[ABS] house(III)[ABS] III-make-CVB.IPFV I.AUX.AOR ‖ III-AUX.AOR
'Rasul was building a house.'

In Lyutikova (2022) and Chumakina & Lyutikova (2023), I argue that the Khwarshi biabsolutive construction can be analyzed as a bi-clausal subject control configuration, whereby the converbial clause contains OC PRO, as represented in (39).[11] The full body of evidence supporting this analysis can be found in Chumakina & Lyutikova (2023). Here I am only highlighting the many common properties the biabsolutive construction shares with infinitival control constructions as discussed above.

(39) $rasul_i$ [PRO_i ʁaj b-u-ho] ejča ‖*b-ejča.
Rasul(I)[ABS] ERG house(III)[ABS] III-make-CVB.IPFV I.AUX.AOR ‖ III-AUX.AOR
'Rasul was building a house.'

Not only transitive verbs with ergative subjects, but also affective verbs projecting dative subjects are attested in the biabsolutive construction (40). Potential verbs with possessive subjects, however, fail to build it. For obvious reasons, it is not clear whether verbs projecting an absolutive subject can appear in the biabsolutive construction. Indeed, if the absolutive subject were replaced with PRO, the result would be indistinguishable from the regular construction. Thus, case restrictions on PRO seem to be the same for the biabsolutive construction and other control configurations.

(40) a. pat'imat-e-l žu loža l-iq'e-he l-ejča.
Patimat(II)-OBL-DAT this word(IV)[ABS] IV-know-CVB.IPFV IV-AUX.AOR
'Patimat knew this word.'

b. $pat'imat_i$ [PRO_i žu loža l-iq'e-he] j-ejča.
Patimat(II)[ABS] DAT this word(IV)[ABS] IV-know-CVB.IPFV II-AUX.AOR
'Patimat knew this word.'

Similarly, the biabsolutive construction bans inanimate controllers. Example (41) shows that transitive clauses with inanimate effectors do not have a biabsolutive counterpart.

(41) a. beq-i ʁur j-eχλ'a-k'-k'a j-ejča.
sun-ERG stone(V)[ABS] V-warm-CAUS-CVB.IPFV V-AUX.AOR
'The sun was warming the stone.'

b. *beq_i [PRO_i ʁur j-eχλ'a-k'-k'a] b-ejča.
sun(III)[ABS] ERG stone(V)[ABS] V-warm-CAUS-CVB.IPFV III-AUX.AOR
Intended: 'The sun was warming the stone.'

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[11] An analysis in terms of subject control has also been proposed for the Tsez biabsolutive construction (Gagliardi et al. 2014).

Transitive idioms, which are expectedly sparse, cannot appear in the biabsolutive construction. In (42a), I show that 'to rain a little', one of the few transitive idioms, projects the standard ergative construction; (42b) using the same idiom in the biabsolutive construction is illicit.

(42) a. dunijal-i   χuχ-leλ'a   esan-ho   l-ejča.
          universe-ERG   face(IV)-hand(IV)[ABS]   wash-CVB.IPFV   IV-AUX.AOR
          'A slight rain was falling.' (lit. The world was washing face and hand)
      b. *dunijal$_i$ [PRO$_i$ χuχ-leλ'a   esan-ho]   b-ejča.
          universe(III)[ABS]   ERG   face(IV)-hand(IV)[ABS]   wash-CVB.IPFV   III-AUX.AOR
          Intended: 'A slight rain was falling.' (lit. The world was washing face and hand)

Finally, the absolutive arguments of the biabsolutive construction have only surface relative scope (43). This means that the embedded absolutive cannot QR to the matrix clause, nor can the matrix absolutive reconstruct in the embedded clause.

(43) q'uni úža$_i$ [PRO$_i$ žibžib kãd   j-ecica-ha]   ejča.
      two   boy(I)[ABS]   ERG   every   girl(II)[ABS]   II-praise-CVB.IPFV I.AUX.AOR
      'Two boys were praising every girl.'
      surface scope: two > every; *inverse scope: every > two

Therefore, I conclude that in Khwarshi, the biabsolutive construction imposes the same restrictions on the arguments of the embedded and main clauses as the control configurations projected by implicative and causative verbs, which allows me to treat these phenomena together. In the next section, I bring together the raising and control phenomena of Khwarshi and compare their properties.

3.3. COMPARING RAISING AND CONTROL. The properties of raising and control discussed in sections 3.1-3.2 are presented in Table 1.

Property	Raising	Control
case in the main clause	+	+
case in the embedded clause	+	+
theta-role in the main clause	–	+
theta-role in the embedded clause	+	+
subject idioms	+	–
inanimate DPs	+	–
matrix DP reconstruction for scope	+	–
case restrictions on the embedded argument	DP core arguments: ABS subject ABS object ERG subject DAT subject	DP subjects: ABS subject ERG subject DAT subject
subject/object asymmetry	– (Equidistance?)	+ (Attract Closest?)

Table 1. Properties of raising and control phenomena in Khwarshi

We see that both phenomena differ significantly from their counterparts in more familiar languages with respect to case licensing of the relevant DP in the embedded clause. In English and similar languages, the absence of syntactic case is considered a reason for A-movement; at the same time, it determines which argument can raise and be instantiated by PRO (or move to a

theta-position under MTC). In Khwarshi, neither raising nor control is conditioned by absence of case in the embedded clause; nevertheless, they differ systematically from each other and exhibit properties typical for raising and control in SAE languages. Thus, raised DPs reconstruct for subject idioms' interpretation, binding and scope, whereas controllers are never interpreted in the structural position of controllees.

Another point of difference concerns the pool of arguments that can be raised or controlled. Only DP-arguments are eligible for these processes; however, control is restricted to DP-subjects, but raising can also affect DP-objects. Presumably, this contrast between raising and control is revealed in Khwarshi due to the fact that case licensing does not interfere with their inherent motivation. Indeed, let us assume that raising and control are driven by some head in the matrix clause attracting DPs. If there is a DP lacking case in the embedded clause, the derivation can only be rescued if this DP is attracted to the matrix clause (where it has a chance to be case-licensed). Therefore, even if raising and control could in principle target a non-subject DP, in languages like English we would not have the opportunity to detect this fact, since any derivation attracting a non-subject DP would leave the infinitival subject caseless. In this regard, Khwarshi provides us with more direct access to the nature of raising and control phenomena. In the last section, I discuss these findings and their relevance for the general theory of raising and control.

4. Discussion. In the previous section, we considered a number of raising-like and control-like phenomena found in Khwarshi. Raising and control turned out to have much in common: both are case-sensitive (or category-sensitive, if we adopt Lyutikova's 2022 syntactic representation of Khwarshi case forms), both are local (no hyperraising or control into a deeply embedded clause is attested), and both take place despite the accessibility of case-licensing in the embedded nonfinite clause. At the same time, raising and control differ with respect to standard diagnostics: argument structure of the matrix predicate, argument selection, interpretation of subject idioms, and scope options. Besides, control appears to be more restricted than raising: only subjects can be controlled but both subjects and objects can raise.

These findings raise several issues related to the typology of raising and control, their scope and their theoretical representation.

First, let us discuss the absence of subject/object asymmetry in Khwarshi raising constructions. Longenbaugh & Polinsky (2018) report on the similar behavior of Niuean raising constructions: the embedded clause licenses both subject and object, and either of them can raise to the matrix clause, thus violating the *Attract Closest* principle. Longenbaugh & Polinsky argue that this violation is spurious, because in Niuean the transitive *v* attracts the object DP to its internal specifier. Consequently, the two core arguments are specifiers in the projection of the same head, thereby equidistant from external probes (Chomsky 2000).

This line of reasoning is not applicable to the Khwarshi data. Using compound reflexive binding as a c-command detector,[12] we can observe that the ergative subject is not only higher than the absolutive object (this is compatible with the analysis involving two specifiers of *v*), but also higher than the dative indirect object (44), which, in its turn, is higher than the absolutive object (45). Therefore, it is highly unlikely that subject and object are equidistant from the higher

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[12] The Khwarshi simple reflexive containing the intensifier (*žu-č* 'self[ABS]-INTS') is subject-oriented and for this reason not suitable for our purposes. The compound reflexive (*isi žu* 'self.ERG self[ABS]') allows for a non-c-commanding antecedent (Testelets 2019). The compound reflexive with intensifier (*isi žu-č* 'self.ERG self[ABS]-INTS') seems to be the right choice, since it allows for non-subject c-commanding antecedents.

probe in the main clause. Evidently, for Khwarshi we need a different mechanism deriving raising of the object past the intervening subject.

(44) a. aminat-i   iłi   iłi-l-eč   rizin-no-s   čakmajil-ba
          Aminat-ERG self(II).ERG self(II)-DAT-INTS rubber-OBL-GEN1 boot-PL[ABS]
          l-ejsa.
          NHPL-take.AOR
          'Aminat took the rubber boots for herself.'
      b. *aminat-e-l   iłi-l   iłi-č || iłi   iłi-l-eč
          Aminat-OBL-DAT self(II)-DAT self(II).ERG-INTS || self(II).ERG self(II)-DAT-INTS
          rizin-no-s   čakmajil-ba   l-ejsa.
          rubber-OBL-GEN1 boot-PL[ABS] NHPL-take.AOR
          Intended: 'Aminat took the rubber boots for herself.'

(45) a. aminat-i   kand-e-l   iłi-l   žu-č   j-akʷa-χ-χa.
          Aminat-ERG girl-OBL-DAT self(II)-DAT self[ABS]-INTS II-see-CAUS-AOR
          'Aminat showed the girlᵢ herselfᵢ.'
      b. *aminat-i   kãd   žu   iłi-l-eč || iłi-l
          Aminat-ERG girl(II)[ABS] self[ABS] self(II)-DAT-INTS || self(II)-DAT
          žu-č   j-akʷa-χ-χa.
          self[ABS]-INTS II-see-CAUS-AOR
          Intended: 'Aminat showed the girlᵢ to herselfᵢ.'

I suggest that the φ-probe in the main clause only attracts DPs bearing a specific information-structural feature like [+topic] or [+pivot]. This restriction would make DPs lacking this feature invisible to the relevant probe. Consequently, if the absolutive object is marked as [+pivot], the probe will skip the ergative subject and attract the object. If no DP bears a [+pivot] feature, raising would not take place, as in (8a), (11a), and (12a). (I assume that the clause can only have one [+pivot] marked DP, otherwise the derivation crashes.) Thus, raising in Khwarshi becomes more like Austronesian symmetric voice systems (Polinsky & Potsdam to appear) where one of the arguments is obligatorily promoted to the pivot position (cf. Pearson 2001 on Malagasy); in Khwarshi, however, the promotion is optional and depends on the presence of the relevant feature on a DP in the embedded clause.

The position of raised arguments is worth discussing. Recall that raised arguments become absolutives of raising-to-object verbs or genitives in nominalizations. Those are evidently non-theta-positions in case of raising. Therefore, we should suppose that projection and theta-licensing of the absolutive/genitive possessor, on the one hand, and case-assignment (and predicate agreement with the absolutive), on the other hand, are separate processes in Khwarshi. For languages like English, Georgian or Warlpiri, this would be a welcome result, since for these languages there is independent evidence that theta-licensing and case-licensing of an argument involve different heads, and in the absence of a case-licensing functional head (v_{tr}, T_{fin}, D_{poss}), the argument is projected but not case-licensed (see Legate 2008 for details on Warlpiri and Georgian). For Khwarshi, however, the existence of raising is the only reason for separating theta-licensing from case-licensing.

At the same time, it is quite remarkable that Khwarshi only attests raising to absolutive (in bi-clausal configurations) and raising to genitive (in nominalizations). These cases form a natural class as unmarked cases of the relevant domain – vP/TP and NP/DP, respectively. We can hypothesize that raised arguments can be assigned only unmarked case because in Khwarshi, all

other cases are (lexically) governed[13] and assigned under theta-licensing. Unmarked case, on the other hand, is not conditioned by theta-licensing and can be assigned to a DP which is theta-licensed elsewhere. This hypothesis, however, needs further elaboration.

The second issue is the applicability of MTC to Khwarshi control configurations. Recall that the controllee can be case-licensed in the embedded clause. Therefore, its movement to the matrix theta-position (assumed by MTC) cannot be motivated by its need for case. Again, an alternative driving force for this movement is required. I suggest that it is the matrix predicate itself that forces the building of the control configuration. Let us suppose that particular matrix predicates cannot discharge one of their theta-roles via external merge.[14] In this case, such a predicate would attract the closest DP out of the embedded clause to its theta-position. In this way, the DP-subject restriction on the controllee would follow from the *Attract Closest* principle and the category restriction on the goal. PP-subjects (e.g., possessive subjects) act as defective interveners blocking attraction of the absolutive object.

Yet another issue often overlooked in movement analyses of control is the absence of reconstruction/connectivity effects. Indeed, if the controllee originates in the embedded clause, it should be able to take narrow scope when the lower copy is interpreted at LF. We can stipulate that movement to a theta-position does not reconstruct, but it is desirable that the absence of reconstruction should follow from more general principles. Longenbaugh & Polinsky (2018) tackle a similar problem in Niuean, where raised DPs do not reconstruct. The authors put forward the hypothesis that this peculiar characteristic of raising results from the fact that Niuean employs copy-raising, not regular (forward) raising. Copy-raising is a construction where an A-chain is formed between a matrix DP and a (resumptive) pronoun in the embedded clause, as in English *John*$_i$ *seems like he*$_i$ *is ill*. Such constructions exhibit A-chain-like behavior (allow for subject idioms, expletive subjects, etc.), but, crucially, are not formed by movement and, consequently, do not show reconstruction effects. Under MTC, we can analyze copy-control along the same lines – as an A-chain involving several theta-positions (Polinsky & Potsdam 2006). If applied to Khwarshi data on reconstruction and connectivity effects, this hypothesis yields the following characterization of the relevant phenomena: Khwarshi control should be copy-control (featuring an empty resumptive pronoun), whereas Khwarshi raising should be regular forward raising. It should be noted, however, that one possible diagnostic of copy-raising/copy-control – case mismatch between copies whereby a less marked case is spelled out (Longenbaugh & Polinsky 2018) – takes identical values for Khwarshi raising and Khwarshi control, which crucially differ with respect to reconstruction effects.

Non-movement theories of control seem to fare better in explaining the absence of reconstruction; moreover, the availability of subject case in the embedded clause can be accommodated if we assume, along the lines of Landau (2015), that what makes PRO special is not its status with respect to case or government, but its semantic content. At the same time, it is

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[13] In Lyutikova (2022), I argue that Khwarshi ergative and dative subjects are assigned case by a dedicated functional head projecting and theta-licensing them (v_{tr} and v_{exp}, respectively) and consider the absolutive as a caseless form. There is no evidence for a configurational treatment of ergative or dative as a dependent case. In principle, the Khwarshi case system can receive a configurational account in the spirit of Baker (2015), whereby it only has lexical and unmarked cases in TP/VP/DP case domains, lacking dependent cases altogether.

[14] I am aware of no precedent for this conjecture; note, however, that in Landau's (2015) model the building of the control configuration is ultimately determined by selection of a special Fin head bearing a [uD] feature and attracting the minimal pronoun in the subject position. In this way, the control relation is "initiated" by higher probes rather than by lower goals.

not clear whether the animacy restriction on PRO attested in Khwarshi can be stated without recourse to selectional requirements of the matrix predicate. Similarly, the specific case restrictions on PRO (which can be absolutive, ergative, dative, but not possessive) and the fact that they coincide precisely with the case restrictions on raised DPs strongly suggest that movement should be involved in the successful analysis of both phenomena.

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