## Proto-Slavic \*j, Van Wijk's law, and ē-stems

Ι

The loss and restoration of the phoneme /j/ plays a major role in the development of Proto-Slavic. At a certain stage (viz. 7.1 of Kortlandt 2011: 166, 301), the hiatus between a word-final and a word-initial vowel was filled with a glide, which was \*j if at least one of the vowels was front and \*w if the preceding vowel was back and the following vowel was rounded, e.g. \*jastē 'to eat', Lith. esti, now with the same initial as \*jaxatē 'to ride', Lith. jóti. As a consequence of this development, initial \*j lost the status of a phoneme before front vowels. The twofold glide before a back vowel gave rise to doublets, e.g. OCS utro and jutro 'morning', ajce and jajce 'egg'. Initial \*[j]e-, \*[j] $\bar{u}$ - was retracted to \*a-, \* $\bar{u}$ -, later o-, u- in East Slavic, e.g. Russian ózero 'lake', útro 'morning', cf. SCr. jëzero, jütro (stage 7.10 of Kortlandt 2011: 168, 303). When the phoneme /j/ was lost altogether (stage 7.15 of Kortlandt 2011: 169, 304), earlier \*[j]e-, \*[j] $\bar{e}$ -, \* $j\bar{a}$ -, \* $j\bar{u}$ - became /e-/, / $\ddot{a}$ -/, / $\ddot{u}$ -/ in South and West Slavic, where they remained phonemically distinct from /o-/, /a-/, /u-/. Analogical reanalysis gave rise to a large number of doublets with initial *je*- and *o*-, especially in East Slavic, where the rise of new /j/ was early, less in South Slavic, and least in West Slavic, where the rise of new /j/ was late (cf. Kortlandt 2011: 257).

Intervocalically, the phoneme /j/ may have been lost at the same time as word-initially. The difference between Čakavian (Novi) pítā 'asks' and kopā 'digs', Bulgarian píta and kopāe points to a common vowel contraction in posttonic syllables before Dybo's law, cf. also Old Polish kopāje and Carpathian (Ublja) byvā 'u, bývāš, bývāt', byvā 'eme, byvā 'ete, byvā 'ut' (cf. Broch 1900: 106), with non-initial stress as a result of Dybo's law, retraction of the stress according to Stang's law from \*-āšt and \*-ātt but not from medial syllables, and restoration of the thematic vowel in \*-à(e)me, \*-à(e)te on the analogy of \*kopāje-, also inst.sg. \*žènō versus \*goròō, with final stress from Dybo's law in Slovene goró and Slovak horou < -ôu, dial. -óv, and in the adjective, e.g. Ukrainian neuter dóbre 'good' < \*-oje, inst.sg. dóbrym, Czech gen.sg. nového 'new', Slovene -ega (cf. Kortlandt 2011: 38, 338). After Dybo's law and the rise of new /j/, the contracted and uncontracted forms may have coexisted during a considerable period of time. The latter were largely restored in East Slavic and in eastern South Slavic.

According to my formulation of Van Wijk's law (e.g. Kortlandt 2011: 169), long consonants were shortened with compensatory lengthening of the following vowel, e.g. SCr. pîšē 'writes' < \*píšše < \*péšje < \*péšje, also gìnē 'perishes' < \*gỷnne < \*gůbne, and \*wòļā < \*wòļļa < \*wàljå 'will'. I have always had doubts about this rule because it does not seem to be a phonetically natural development and because the final parts of the long consonants could largely be regarded as realizations of the phoneme /j/ (cf. Kortlandt 2011: 167). Moreover, original \*-ingn- developed into South Slavic -ėn- and North Slavic -ęn- around the same time (cf. Kortlandt 2009: 108). It is therefore probable that the length of the thematic vowel in ne-presents is analogical after the corresponding je-presents (cf. in this connection Tedesco 1948) and that postconsonantal \*j was preserved until the operation of Van Wijk's law (my stage 7.15). It follows that my assimilation of \*j to a preceding consonant (2011: 167, 302)

must be abandoned. Here I shall give an improved version of my earlier account of the consonantal developments (2011: 151-153, also 164-171 and 300-305).

- C1. (6.2) First palatalization of velars:  ${}^*k > \check{c}$ ,  ${}^*g > \check{z}$ ,  ${}^*x > \check{s}$  before  ${}^*e$ ,  ${}^*\bar{\iota}$ ,  ${}^*\bar{\iota}$ ,  ${}^*j$ . The opposition between  ${}^*e$ ,  ${}^*\bar{e}$  and  ${}^*a$ ,  ${}^*\bar{a}$  was neutralized after palatals.
- C2. (6.3) Spirantization of the voiced affricate:  ${}^*\check{g} > \check{z}$ . This development was determined by the absence of a voiced counterpart to  $\check{s}$  in the earlier system. It was blocked by a preceding  ${}^*z$ .
- C3. (6.4) Palatalization of dental fricatives: \* $s > \check{s}$ , \* $z > \check{z}$  before \*j, \* $\check{c}$ , \* $\check{g}$ . This development was probably posterior to C2 because it introduced  $\check{z}$  from another source and thereby eliminated the motivation for the spirantization of \* $\check{g}$ .
- C4. (6.6) Second palatalization of velars:  ${}^*k > \acute{c}$ ,  ${}^*g > \acute{g}$ ,  ${}^*x > \acute{s}$  before the new front vowels  ${}^*\bar{e}$  and  ${}^*\bar{u}$  which had arisen from the monophthongization of  ${}^*ai$  and  ${}^*oi$ , and after the high front vowels  ${}^*i$ ,  ${}^*\bar{\iota}$ ,  ${}^*\bar{\iota}$  unless followed by a consonant or by one of the high back vowels  ${}^*u$ ,  ${}^*\bar{u}$ ,  ${}^*u$ ,  ${}^*u$ . The clusters  ${}^*sk$  and  ${}^*zg$  became  $\acute{s}\acute{c}$  and  $\acute{z}\acute{g}$  before the new front vowels. This development restored the opposition between  ${}^*\bar{e}$  and  ${}^*\bar{a}$  after palatals, e.g. vbsb 'all', f.sg./n.pl. vbsa, gen.loc.pl.  $vbs\check{e}xb$ .
- C5. (6.7) Rise of geminated affricates: \*tj > \* $t\acute{c}j$ , \*dj > \* $d\acute{z}j$ . The clusters \*stj and \*zdj became \* $st\acute{c}j$  and \* $zd\acute{z}j$ , respectively. This development has a modern parallel in Ukrainian, e.g.  $z\acute{z}ttj\acute{a}$  'life'. It was probably posterior to C4 because otherwise the gemination would hardly have been preserved. The cluster \*kt yielded \* $t\acute{c}$  before high front vowels, e.g. OCS  $no\acute{s}tb$  'night', SCr.  $nô\acute{c}$ .
- C6. (7.3) First simplification of palatals:  $*\acute{c} > c$ ,  $*\acute{g} > g$ , in South and East Slavic also  $*\acute{s} > s$ ,  $*\acute{s}\acute{c} > sc$ ,  $*\acute{z}\acute{g} > zg$ . The resulting dentals continued to be palatalized for some time. This change was motivated by the abundance of palatals which the previous developments had created. It was probably posterior to C5 because the geminated affricates were preserved.
- C7. Simplification of geminates: \* $t\acute{c}$  > \* $s\acute{c}$ , \* $d\acute{g}$  > \* $t\acute{z}\acute{g}$ , also \* $s\acute{t}\acute{c}$  > \* $s\acute{c}$ , \* $t\acute{z}d\acute{g}$  > \* $t\acute{z}\acute{g}$ . This development was limited to Bulgarian. It was posterior to C6 because the new \* $s\acute{c}$  and \* $t\acute{z}\acute{g}$  did not merge with the earlier \* $s\acute{c}$  and \* $t\acute{z}\acute{g}$ . The simplification of the ungeminated palatals at stage C6 had eliminated the reason for the existence of the geminated affricates. In the other languages, the dental affricates were simply degeminated: \* $t\acute{c}$  > \* $t\acute{c}$  and \* $t\acute{d}\acute{g}$  > \* $t\acute{g}$ .
- C8. (7.7) Spirantization of the ungeminated voiced affricate:  ${}^*3 > z$ . This development did not reach Lechitic and a part of the Bulgarian dialects. It was probably posterior to C7 because we would otherwise expect the degemination of the voiced affricate  ${}^*d\acute{z}$  rather than its parallelism with  ${}^*t\acute{c}$ . It was certainly posterior to C6 because the final outcome of the second palatalization of g in Czecho-Slovak is z, not  $\check{z}$ . The spirantization of the velar stop g in the central dialects of Slavic was probably not much later than this development, perhaps even earlier.
- C9. (7.15) Van Wijk's law and loss of /j/. Postconsonantal \*j was assimilated to the following vowel, e.g. SCr.  $p\hat{i}\hat{s}\bar{e} < *p\hat{i}\hat{s}\hat{j}e$ , also \* $w\hat{o}|\bar{a} < *w\hat{o}|ja$ . It was posterior to C8 because the spirantization did not take place before \*j in Slovak and Serbo-Croatian. C10. (8.4) Merger of palatal fricatives: \* $\hat{s} < \hat{s}$ , also \* $\hat{s}\hat{c} < \hat{s}\hat{c} < \hat{s}\hat{c}$ , \* $\hat{z}\hat{z} < \hat{z}\hat{z}$ .
- C11. (8.5) Merger of palatal clusters: \* $\check{s}\check{c}$  >  $\check{s}\acute{c}$ , \* $\check{z}\check{j}$  >  $\check{z}\acute{j}$ .

Croatian, and later in Czecho-Slovak. Similarly, the clusters \*sc and \*zʒ became st and zd in a part of the Bulgarian dialects.

II

Van Wijk's law plays a major part in Rainer Fecht's dissertation on the accentuation of Slavic volja (2010), which offers a detailed analysis of the morphological type. Unfortunately, the author's highly traditional background makes it difficult for him to appreciate the chronological aspects of the problems involved. Thus, he writes: "Kürze und Länge waren im Urslavischen [...] nicht distinktiv" and "der Erhalt von Längen in der Vortonsilbe von Zweisilbern gegenüber deren Kürzung in Silben mit akutierter Intonation in nachurslavischer Zeit" (Fecht 2010: 19) without bothering about the phonological systems of the consecutive stages. In fact, the distinction between short and long vowels was never lost in Slavic (cf. Vermeer 1992), pretonic long vowels were shortened before Dybo's law but preserved after Dybo's law (which affected both short and non-acute long vowels), and the shortening of the acute was a Proto-Slavic development (cf. Kortlandt 2011 passim). Fecht categorizes the acute as "lang steigend" (2010: 23) in spite of the fact that it was not rising when it was long (as opposed to the long rising neo-acute) and that it was not long when it merged with the short rising neo-acute in Late Proto-Slavic. He defines Dybo's law as an accent shift "von einer fallend intonierten Silbe" (2010: 25, 26) while such syllables were actually rising at the time of the shift. He has understood correctly that "für das Vorurslavische [i.e. before Dybo's law] mit drei distinktiven Intonationen gerechnet werden [muss]" but adds that "sich die steigende Intonation von der fallenden in Ap b einerseits und der 'besonderen' in Ap c andererseits unterschieden hat" (Fecht 2010: 27). In fact, we must reconstruct a rising tone in (b) and a falling tone in (c), e.g. \*bòbъ versus \*bồsơ. The neo-acute is a rising tone which originated before Dybo's law, which in turn preceded Stang's law. Fecht points out correctly that such nouns as volja combine fixed stress (a) with neo-acute tone (b).

According to Stang (1957: 179), the neo-acute is due "to a retraction of the stress from a semi-vowel or from a non-initial vowel with falling intonation". These are different retractions: first from final jers (my stage 8.2), e.g. Slovene gen.pl. gór < \*gorò 'mountains', dán < \*dóno < \*donò 'days', óvoc < \*ovocò 'sheep', loc.pl. možéh < \*-ext 'men', Russian dat.pl. détjam < \*-bmb 'children', then from long falling vowels in final syllables not counting final jers (Stang's law, my stage 9.3), e.g. Slovene nósim 'I carry', tónem 'I sink', passive participle nóšen, loc.sg. kônju, loc.pl. kónjih 'horse(s)', also vólja 'will', and finally from non-final jers, e.g. Slovene nóžka 'little foot', nóžnica 'sheath', *dvŷrnik* 'courtier'. Fecht confuses the issue by lumping all of these together under the name "Stang-Ivšićs Gesetz" (2010: 32), unduly referring to Greenberg (2000: 92), who made quite clear that the retractions from final and non-final jers cannot be identified with Stang's law, as Ramovš had pointed out in 1921 already. Though Ivšić recognized the retraction of the stress from non-initial long falling vowels, he did not understand the extent of his findings (cf. Kortlandt 2011: 272). It is Stang's great merit that he has identified the relation between the retraction and accent paradigm (b) and distinguished between different retractions of the stress.

It must be regretted that Fecht does not observe the distinction between the high-mid vowels  $\varrho$  [ie],  $\varrho$  [uo] and  $\varrho$ ,  $\varrho$  (2010: 40, fn. 88) because this distinction, which is absent from the standard language, is crucial for the development of the vowel

system in the dialects (cf. Greenberg 2000: 16, 171-178, Kortlandt 2011: 250). In my chronology (2011 passim),  $\rho$  developed at stages 8.2 (retraction of the stress from final jers), 8.8 (lengthening of short falling vowels in monosyllables) and 10.7 (progressive accent shift), and  $\rho$  ["0] at stages 9.3 (Stang's law), 10.1 (denasalization of the nasal vowels), 10.9 (rise of the neo-circumflex) and 10.11 (lengthening of short vowels in non-final syllables), while stressed  $\rho$  [3] arose at stage 10.12 (retraction of the stress from final short vowels. Fecht's account of the Slovene data (2010: 41) is misleading, not only because nom.sg. " $\nu \dot{e} r a$ ", inst.sg. " $\nu \dot{e} r a$ " 'faith' should read  $\nu \dot{e} r a$ ,  $\nu \dot{e} r a$ , but especially because acc.sg.  $n \dot{o} g \rho a$  and inst.sg.  $n \dot{o} g \rho a$  'foot' are innovative forms replacing older  $n o g \dot{\rho} a$  and  $n o g \dot{\rho} a$ , respectively, and because inst.sg. " $\nu \dot{e} r a \rho a$ " 'wife' represent the more archaic forms of the mobile paradigm (c) instead of the original paradigm (b) with acc.sg.  $\nu \dot{e} r \rho a$  and inst.sg.  $\nu \dot{e} r \rho a$  (with an analogical circumflex).

Fecht subscribes to the outdated view that the acute is reflected as a long vowel in Czech (2010: 48), in spite of such obvious counter-examples as čas, had, hněv, jih, kraj, pluh, rak. There are four reasons why this view is mistaken. First, we find a quantitative alternation in the paradigm of Czech kráva 'cow', which has a short root vowel in inst.sg. kravou, gen.pl. krav, dat.pl. kravám, inst.pl. kravami, loc.pl. kravách. This rather suggests lengthening of Proto-Slavic short rising \*à in an open first syllable of disyllabic word forms which was blocked by a long vowel in the following syllable. Second, the same lengthening is found in kůže 'skin', koží, koží, kožím, kožemi, kožích, also můžeš 'you can', which never had an acute root vowel. Third, the same lengthening is found in trisyllabic word forms where a jer was lost in the initial syllable, e.g. lžíce 'spoon', lžicí, lžic, lžicím, lžicemi, lžicích, also psáti 'to write', psal 'wrote', psaní 'writing', spáti 'to sleep', supine jdi spat 'go to sleep'. This puts the lengthening after the loss of pretonic jers. Fourth, the Czech lengthening cannot be separated from the one in Upper Sorbian kruwa < krówa 'cow', which shows that it was more recent than the metathesis of liquids.

I do not accept the common view that the lengthening in such instances as Czech kůň 'horse', stůl 'table', nůž 'knife', Slovak kôň, stôl, nôž is the result of phonetic conditioning because the number of counter-examples is prohibitive. More probably, the long vowel was adopted from the case forms where the accent had been retracted as a result of Stang's law, viz. loc.sg. \*kôňi, inst.pl. \*kôňi, loc.pl. \*kôňix, and from gen.pl. \*kōň, Slovene kônju, kónji, kónjih, kónj, so as to yield a regular alternation between stressed \*ô and unstressed \*o in the paradigm. After the retraction of the stress in gen.sg. \*koňa, dat.sg. \*koňu, inst.sg. \*koňem, nom.pl. \*koňi, acc.pl. \*koňe, dat.pl. \*koňem, and perhaps after the shortening of \* $\dot{o}$  to \* $\dot{o}$  before the new long case endings in gen.pl. -ôv, -í and loc.pl. -iech, -ích, the paradigm could be further regularized by generalization of the short root vowel, a process which has been going on in historical times, e.g. Czech skot 'cattle', Old Czech skót. The pattern with a long vowel in the nom.sg. form and a short vowel in the other cases spread to the other accent classes, e.g. Cz. Slk. mráz 'frost' (a), Czech sníh 'snow', hnůj 'dung', dům 'house', sull 'salt' (c). The diphthongal character of Slovak  $\hat{o}$  was lost after the initial cluster in dvor 'yard', svoj 'one's own', tvoj 'your', tvorca 'creator', cf. Czech dvůr, svůj, tvůj, tvůrce.

Fecht points out correctly that the "Vortonlänge in Zweisilbern des Ap c ist nur im Serbokroatischen erhalten" (2010: 56, fn. 121). This is because pretonic long vowels were shortened before Dybo's law, e.g. SCr.  $j\dot{e}zik$ ,  $m\dot{a}lina$ ,  $r\dot{a}kita$ ,  $dal\dot{e}ko$ ,  $sv\dot{e}dok$ ,  $du\dot{z}n\bar{t}k$ ,  $gl\dot{a}dn\bar{t}$ ,  $gr\dot{a}dsk\bar{t}$ ,  $r\dot{u}kama$ ,  $r\dot{u}cn\bar{t}k$ ,  $hl\dot{a}dn\bar{t}$ ,  $t\dot{e}sk\bar{t}$ ,  $m\dot{u}sk\bar{t}$ ,  $g\dot{u}st\bar{t}$ ,  $sv\dot{e}t\bar{t}$ ,

krìvī, mlàdī, dràgī, glùhī, mèkī, sùhī, Čak. (Hvar, Vrgada, Susak) muškî, Slovene mehkî, Czech chladný, těžký, suchý, ruka, ruční, ručník, humno, sukno, Polish sędzia. Pretonic long vowels in disyllabic forms of accent paradigm (c) in Serbo-Croatian are evidently the result of restoration on the analogy of the baritone forms. Long vowels which became pretonic as a result of Dybo's law remained long, e.g. SCr. národ, rázlika, zábava, tráva, trâvnī, trâvnīk, bêlī, pûtnīk, Czech bílý, poutník, tráva, trávní, trávník, zábava, útroba, Polish wątroba. Posttonic long vowels were usually preserved in Proto-Slavic.

Fecht follows the common view that Dybo's law shifted the stress onto final jers, e.g. in nom.sg. and gen.pl. \*kònjb (2010: 83), and is thereby unable to explain the difference between the Slovene forms kònj and kónj. He refers to Stang (1957: 70) for the view that the length in the gen.pl. form may have been taken from the loc.pl. form kónjih, where the stress was retracted in accordance with Stang's law. This is impossible because Stang's law yielded  $\varrho$  (which is actually attested in the loc.pl. form), not o, which must have been taken from the gen.pl. form, as Ramovš pointed out already (1921: 229). The long vowel in the gen.pl. forms originated phonetically from retraction of the stress from a final jer in mobile accent paradigms (c) and gradually spread to (a) and (b) nouns to an unequal extent in the separate Slavic languages (cf. Kortlandt 2009: 111-116 for details). Fecht's suggestion that the retracted stress in the (b) loc.pl. form was taken from the (b) *u*- and *i*-stems (2010: 85) cannot be correct because the stress was not retracted from strong jers. Moreover, the same retraction took place in the inst.pl. form and did not take place in the dat.pl. form, which is contrary to his suggestion. Note that Fecht's objection to my view (2010: 25, fn. 50) does not hold water: since the "Nichtakzentuierbarkeit eines Vokalphonems" does not imply "das Fehlen von dessen silbenbildendem Charakter", the idea that "wortauslautenden nichtsilbenbildenden Lauten ein graphischer Wert zugeschrieben wird" does not apply.

As I pointed out above, contractions in posttonic syllables after the loss of intervocalic \*j affected not only West Slavic and western South Slavic but also the other Slavic languages, e.g. Bulgarian píta versus kopáe, Ukrainian dóbre, dóbrym. The retracted accent resulted from Stang's law and the preservation of length in the initial syllable shows that the contractions preceded Dybo's law, which rendered the distribution of contracted and uncontracted forms opaque. Thus, between Dybo's law (stage 8.7) and Stang's law (stage 9.3) we have to reconstruct fixed stress and a falling tone on the second syllable in accent paradigm (b) of the definite adjective, e.g. \* $b\bar{e}l\hat{y}$ 'white', and after Stang's law neo-acute on the initial syllable of disyllabic word forms (but not in polysyllabic forms, cf. the Ublja forms cited above). Fecht's account of my view (2010: 103) is hopelessly confused. In accent paradigm (c) we have to reconstruct final stress where Dolobko's law operated, as in Slovene lahkegà, lahkemù 'light', and the non-initial stress of the indefinite adjective elsewhere. Contrary to Fecht's reconstruction (2010: 106), the pronoun \*jo had fixed stress (b) and could later develop enclitic forms in certain syntactic environments in the separate languages (cf. Kortlandt 2013).

Fecht classifies the suffixes \*-bj- and \*-ot- as dominant (2010: 113, fn. 245) but calls the suffix \*-bj(e) "rezessiv" (2010: 114). In fact, \*-ot- is originally recessive and \*-bj- is always dominant. The comparative in \*-je has neo-acute tone in Czech  $h\mathring{u}\check{r}e$  'worse',  $m\acute{e}n\check{e}$  'less', Russian dial.  $b\^{o}le$  'more',  $mol\^{o}\check{z}e$  'younger' as a result of the successive operations of Van Wijk's, Dybo's and Stang's laws. The short vowel of

Čakavian *mläjē*, *dräžē* (Fecht 2010: 117) was evidently taken from the definite adjective. Fecht's view that Van Wijk's law did not operate in \**moldje* and \**dorgje* because "mehr als ein Konsonant im Stammauslaut [steht]" (2010: 118) is mistaken because the metathesis of liquids (my stage 7.12) preceded Van Wijk's law (stage 7.15).

Fecht ignores the origin of the Slovene neo-circumflex (2010: 125f.), which is our major source of knowledge about posttonic quantity in Slavic (cf. Kortlandt 2011: 51-58 and 2012). He rejects my chronological analysis of the loss of the PIE laryngeals on a priori grounds without discussing the evidence. He attributes the length of Polish short stem vowels in gen.pl. forms to "Ersatzdehnung beim Schwund des auslautenden Jer" (2010: 134). This is a mistake because we find a short vowel e.g. in pęt 'fetters', blot 'marshes', also Slovincian làt 'years'. Length is regular only in the mobile accent type (c), where the stress was retracted from the final jer, e.g. Polish rąk of ręka 'hand'. In Slovincian, remjóun (gen.pl. of rèmją) has taken the length of mjóun (gen.pl. of imją), whereas Polish imion shows the converse analogical development. On the other hand, Slovincian jàgnjąt and cieląt have preserved the phonetically regular short vowel, while the corresponding Polish forms show analogical length (cf. Kortlandt 2009: 111-113).

After Dybo's law we have \*voļâ < \*vòlja 'will' but \*rolbjà < \*orlbja 'plowland', after contraction \*roļá in Slovincian roláu. The loss of distinctive tone yielded merger of the two paradigms, as a result of which most nouns of the former type adopted the accentuation of the latter (cf. Fecht 2010: 136f.). Thus, we have e.g. vùolå and vùola, vùonja, roláu and rùola, cąžáu 'weight' and cenjáu 'shadow', sušáu 'drought' and močáu 'moisture', Old Polish wolå, woniå, rolå, suszå, cf. lodziå 'boat', sędziå 'judge' < \*-bjà. The converse development took place in some Russian dialects, where the long vowel of \*voļâ was evidently shortened to \*-à before Stang's law (cf. Fecht 2010: 143f.). The word then joined accent paradigm (b) or (c) and could even become enclitic, e.g. dóvoli, ná volju (cf. also Kortlandt 2013). Note that nevólja received medial stress as a result of Dybo's law (ibidem). There is no reason to assume a separate accent class here, as Fecht proposes.

Fecht objects to my formulation of Van Wijk's law that "Ersatzdehnung [...] in der folgenden [Silbe] phonetisch äußerst fragwürdig [erscheint]" (2010: 160). As I have pointed out elsewhere (2012: 119), the development of \* $v\dot{o}l\bar{a} < v\dot{o}l\bar{a}$  may be compared with that of Old Icelandic *ljúga* 'to lie' < \**liugan*. The type of Polish *pieśń*, pieśnia 'song' (Fecht 2010: 162) represents a different formation. The coexistence of Serbo-Croatian bàsna with Russian basn' and básnja 'fable' (also ukorízna 'reproach', bojázn' 'fear') points to an alternating paradigm with acc.sg. \*-snin and gen.sg. \*-snās which can be identified with Old Prussian crixtisnā 'baptism', gen.sg. crixtisnas, acc.sg. crixtissennien (cf. Kortlandt 209: 138). In an anachronistic mood, Fecht returns to the original formulation of Van Wijk's law in terms of metatony in a mobile accent paradigm (2010: 172-174), thereby rejecting the essence of Stang's revolutionary study (1957). He dates this metatony after Dybo's law (2010: 177, fn. 391) without explaining why the *volja* type did not develop enclitic forms at an earlier stage, as other (c) nouns did. He claims that there are no mobile masc. jo-stems in Proto-Slavic (2010: 180, fn. 395) without mentioning \* $m\hat{\rho}\check{z}b$  'man'. He admits that he is unable to explain the accentuation of \*görje 'grief', \*mörje 'sea', \*pölje 'field', \*zemjà 'earth', \*dūšà 'soul' (2010: 181). I conclude that his theory cannot be accepted.

Fecht identifies five volja type words with Baltic cognates, viz. \*dolja 'share', \*noša 'burden', \*rodja 'face', \*vodja 'leader', \*volja 'will', and observes that "diese fünf Bildungen ohne Ausnahme eine verbale Grundlage haben" (2010: 194). This is an important observation because we can distinguish between four different types of iH-stem in Balto-Slavic, viz. proterodynamic and hysterodynamic  $\bar{\imath}/j\bar{e}$ - and  $\bar{\imath}/j\bar{a}$ -stems (cf. Kortlandt 1997 = 2009: 129-135). In Slavic, original  $\bar{e}$ -stems were redistributed as  $\bar{a}$ - and i-stems according to animacy and gender while proterodynamic and hysterodynamic iH-stems are usually reflected as ja- and bja-stems, in Lithuanian as  $j\bar{a}$ - and  $\bar{e}$ -stems, respectively. It follows that the original difference between  $\bar{\imath}/j\bar{a}$ - and  $\bar{\imath}/j\bar{e}$ -stems can only be established on the basis of the Prussian and Latin evidence. Since deverbal abstracts are proterodynamic  $\bar{\imath}/j\bar{e}$ -stems in these languages while the other types represent denominal formations (cf. Schrijver 1991: 382-387 on Latin), we must conclude that \*dolja, \*noša, \*rodja, \*vodja, \*volja are original proterodynamic  $\bar{\imath}/j\bar{e}$ -stems.

Denominal formations such as \*koža 'skin' are jā-stems. Kapović lists seven volja type nouns with mobile accentuation (c), viz. \*dūšà 'soul', \*zemjà 'earth', \*medjà 'border', \*željà 'wish', \*gospodjà 'lady', \*zorjà and \*zārjà 'dawn', \*rodjà 'rust' (2007: 100). Since \*dūšà was borrowed as a proterodynamic ī/jā-stem in Prussian dusi, acc.sg. dūsin, doūsin, daūsin (cf. Kortlandt 2009: 262), I assume that this was the original Slavic paradigm. Its accentuation may be compared with that of Lith. patì, gen.sg. pačiōs 'wife', which also belongs to the mobile accent class (4). The same evidently holds for the word \*gospodjà 'lady'. On the other hand, the deverbal nouns \*željà and \*žoljà (cf. Vasmer 1953: 427), \*zorjà, \*rodjà and \*ložà 'lie', which seems to be identical with Old High German lugī, are probably original proterodynamic ī/jē-stems. The variant \*zārjà (b) beside \*zorjà (c), Czech záře beside zoře, may have taken its lengthened grade from the original root noun \*žār which is reflected in \*žâro beside \*žārà 'heat' (cf. Derksen 2008: 541) in view of the Baltic cognates Lith. žarà (4), Old Prussian sari 'glow'.

Slavic \*zemjà 'earth' can be identified with Lith. žēmė (2) and Old Prussian semmē as an original ē-stem representing an earlier consonant stem (preserved in Old Russian zemb), just as Lith. ùpė 'river', sáulė 'sun', mùsė 'fly'. Like the Baltic words, Slavic \*země was originally stem-stressed (b), as is clear from the Old Slovene, Kajkavian and Old Russian evidence (cf. Kortlandt 2011: 63f.). I also assume an original  $\bar{e}$ -stem for \*světjà (b) 'candle' < \*kuoit-, which looks like an alteration of Lith.  $\check{z}v\tilde{a}k\dot{e}$  (2) 'candle', perhaps under the influence of \* $gv\check{e}zd\dot{a}$  (b) 'star' < \* $\acute{g}^huoid^h$ -, Lith. žvaigždė̃, and of \*svėto 'light'. In the case of \*medjà (b, c) 'border', the coexistence of Lith. *mēdis* (2) 'tree' and *mēdė* (2) 'forest' points to a neuter in \*-jan beside a collective in \*-ē or \*-jā, cf. OPr. garian, garrin 'tree' beside Lith. gìrė, girià (2) 'forest', OPr. soalis, sālin 'herb' beside Lith. žolē 'grass', also OPr. neuter krawian beside fem. krawia, *crauyo* 'blood'. These collectives represent original hysterodynamic *ī/jā*-stems, like Latin *māteriēs* 'matter, wood' (cf. Schrijver 1991: 386). The expected reflex of this type in Slavic are the collectives in \*-bjà such as Russian sem'já 'family', Latvian sàime. It follows that \*medjà probably replaced an earlier hysterodynamic paradigm on the basis of the more frequent proterodynamic type.

As to the accentuation of the iH-stem formations, I would expect the same as in Vedic Sanskrit, where we find e.g.  $dev\vec{i}$  'goddess', acc.sg.  $dev\vec{i}m$ , gen.sg.  $devy\vec{a}s < *-iaHs$  for the proterodynamic type and  $vrk\bar{i}s$  'she-wolf', acc.sg. vrkiam, gen.sg. vrkias

< \*-iHas for the hysterodynamic type. This is indeed what we find in Lith. patì, gen.sg. pačiōs (4), Slavic \*gospodjà (c) and Lith. vìlkė (1) < \*wilkìH-aH, Russian volčica < \*wilkìH-kaH (cf. Kortlandt 2011: 323). Hysterodynamic nouns in \*-bjà received final stress as a result of Dybo's law, e.g. Russian sem'já 'family' < \*-ìH-aH, sud'já 'judge' < \*-ìH-eH (cf. Kortlandt 2009: 134). The proterodynamic nouns \*dūšà (c) 'soul' and \*zorjà (c) 'dawn' have probably preserved the original accentuation. The other proterodynamic jā-stems evidently adopted the accent pattern of the deverbal ā-stems, which had fixed stress on the initial syllable of the word in Balto-Slavic (cf. Kortlandt 2011: 69). After Van Wijk's law, they received final stress (b) as a result of Dybo's law, after which the accent was retracted according to Stang's law in Late Proto-Slavic, thus yielding the regular volja type in the modern languages.</p>

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