

# Idiosyncrasy of the Soikkola Ingrian ternary foot at the Finnic and broader typological background

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Ternary feet represent challenges for metrical stress theories and are often contested in formal phonological accounts. For example, they are represented as recursive binary feet, binary feet with extrametrical syllables, or as an alternation of stressed and stressless feet (Martínez-Paricio & Kager 2015; Torres-Tamarit & Jurgec 2015; Golston 2019). In such accounts, surface ternary feet are generally claimed to consist of binary only or binary and unary prosodic feet.

Here I present data on the ternary foot in Soikkola Ingrian, a minor Finnic variety of Russia, in comparison with the binary foot and the combination of the binary and the unary foot. Two prosodically conditioned processes are considered: specific types of gemination at the 1<sup>st</sup>/2<sup>nd</sup> syllable boundary and long vowel reduction in the 2<sup>nd</sup> syllable. These processes were seen as interrelated and pertinent to the ternary foot as early as in Sovijärvi (1944: 182–184).

1. Prosodic rules of **gemination** in binary and ternary feet, historically a phonetic but by now a phonologised process in Soikkola Ingrian, can be summarised as follows:

— (a) in a di- and trisyllabic foot: before long vowels: \**kurkī* > *kurkkī* ‘crane:ILL’, *kerkīmä* > *kerkkīmä* ‘be\_in\_time:1PL’;

— (b) in a trisyllabic foot ONLY: before two light syllables \*-CVCV(C), and:

(i) if the first syllable of the foot was light (C)V, the second syllable vowel, which was phonetically half-long, became phonologically long: \**omena* ['ome·na] > *oṁmēna* ‘apple’;

(ii) if the first syllable of the foot was heavy (any other type), the second syllable vowel remained phonetically and phonologically short: \**murkina* > *murkkina* ‘breakfast’.

2. Second syllable **long vowel reduction** is a more recent and still ongoing process, which we phonetically studied in 22 types of trisyllabic feet, four shortest of which were compared to the disyllabic feet with the same structure of the first two syllables. Its rules go as follows:

— (a) disyllabic feet always maintain the second syllable long vowel: *kurkkī* etc;

— (b) trisyllabic feet undergo reduction of the second syllable long vowel: *kerkkīmä* > *kerkkīmā* = *murkkina*, apart for the shortest structure with the former first stressed light syllable, \**omena* ['ome·na] > *oṁmēna*, where the second syllable long vowel is still maintained.

3. In the trisyllabic structures with the long vowel in the third syllable, which consist of a binary and a unary foot, the first foot behaves like a normal binary foot in both respects:

— (a) there is gemination only before a second syllable long vowel but not before a short one: *kerkīmä* > *kerkkīmā* ‘be\_in\_time:SUP’, but \**murkinā* ['murgi·na:] > *murkinā* ‘breakfast:PRT’.

— (b) the second syllable long vowel does not undergo reduction: *kerkkīmā* ['kergi·mä:] etc.

The idiosyncratic features of the Soikkola Ingrian disyllabic foot are summarised below:

Structure type	Gemination before a short vowel	Reduction of the 2 <sup>nd</sup> syllable long vowel
2-syllabic foot	✗ <i>kurki</i> ['kurgi] ‘crane’	✗ <i>kurkkī</i> ['kurk'i:] ‘crane:ILL’
2+1-syl. bifoot	✗ <i>murkinā</i> ['murgi·na:] ‘breakfast:PRT’	✗ <i>kerkkīmā</i> ['kerk'i·mä:] ‘be_in_time:SUP’
3-syllabic foot	✓ <i>murkkina</i> ['murk·ina] ‘breakfast’	✓ <i>kerkkīmā</i> > ['kerk'īmä] ‘be_in_time:1PL’

These data show that the third syllable in the Soikkola Ingrian trisyllabic foot cannot be simply considered extrametrical, as it directly contributes to the prosodic processes within the first two syllables. Neither can it be considered as a separate foot, as the bifoot trisyllabic structure behaves differently. As for the foot recursion, it is still unclear whether recursion at the prosodic levels below the word is a valid and uncontroversial theoretical concept (cf. the

RecPhon2019 conference). Therefore, I rather maintain the view that the ternary foot in Soikkola Ingrian has an independent prosodic status from both the unary and the binary foot.

The two features of the Soikkola Ingrian trisyllabic foot are particular in the Finnic space. Both gemination and non-initial vowel reduction are attested in many different Finnic varieties. However, gemination in the trisyllabic foot (i.e. before a short vowel) is a unique feature of the Ingrian dialects, first of all, of Soikkola and Hevaha (Porkka 1885: 39; Kettunen 1940: 186; Sovijärvi 1944: 14–15, 25–26, 82–84; Laanest 1966: 30; Rapola 1966: 32). Vowel reduction is widely spread, for example, in the Finnic varieties of historical Ingria (Kuznetsova 2016), in the Finnish dialects of Finland (Penttilä 1926: 44–45), and in Estonian dialects (Tauli 1956: 66–84). However, nowhere it has been attested as a feature specifically distinguishing between the di- and the trisyllabic foot, like in Soikkola Ingrian.

It could be, therefore, concluded that Soikkola Ingrian manifests one of the most compelling cases of the ternary foot both in the Finnic space and against a broader cross-linguistic background. The presumed stress pattern here finds support in two explicit prosodically-motivated processes, initially phonetic and later phonologised, which are observed both in the history and in the current state of the language development.

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