

A quantitative approach to the reconstruction of the PIE quality modifier construction

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Keywords: Proto-Indo-European, adjectival typology, quantitative approach, token-based typology

Scholars usually think PIE had the same parts of speech of Latin: nouns, verbs and adjectives. However, PIE adjectives show the same endings as nouns, comparative morphology is lacking in Hittite, Tocharian, Armenian and Albanian, and most PIE adjectives show the “recent” inflection in *-e/o-. Thus, some scholars argued that the adjective is a recent category in PIE (Wackernagel 2009: 466, Lehmann 1974: 208, Comrie 1997: 101). However, this idea was further developed into two opposite directions. Some claimed that, in an early phase, quality concepts were merged with nouns in the lexicon (Balles 2006, 2009) and the PIE adjectives arose from appositional nouns added to the feminine motion suffix (Brugmann 1888: 420; Fritz & Meier-Brügger 2020: 225). Others claimed that, originally, quality concepts – typically coded by the so-called Caland roots - were merged with intransitive verbs in PIE or Pre-PIE (Bozzone 2016): thus, adjectival endings could have arisen from nominal endings added to the feminine motion, but the adjective as a class of primary lexemes should have arisen from participles or participial-like nominalizations built on verbal roots of quality or near-quality meaning (Alfieri 2016, 2021).

The aim of the talk is to provide the empirical ground needed for discussing the problem above in a typologically-consistent, text-based, quantitative perspective. In practice, the adjective is defined as the most typical quality modifier construction (Croft 2001: 67, Hengeveld 1992) and this definition is applied to a corpus of texts from 4 ancient IE languages, namely: 52 hymns of Rig-Veda, 2 books by Homer, Sallust’s *De coniuratione Catilinae* and an equivalent corpus of Hittite texts. All quality modifier constructions in each corpus are gathered (700-1000 in each case), their morphemic structure is analysed and evaluated quantitatively, distinguishing type and token frequency (see Levshina 2019, 2021).

Two different methods of parsing can be used, a lexicalist, word-based approach (e.g., Blevins 2016), or a morpheme-based approach (e.g., Dressler et al. 1987). If the word-based approach is used, only three adjectival constructions are found in each language, namely adjectives in traditional sense (e.g., *black*), participles (e.g., *shining*) and compounds (e.g., *red-haired*):

	Classical Latin		Homeric Greek		Hittite		RV Sanskrit	
	Token	Type	Token	Type	Token	Type	Token	Type
[adjective]-Agr	88.3%	77.9%	60.4%	53.4%	85.2%	76.1%	48.5%	30.8%
[participle]-Agr	5.2%	10.2%	13.0%	18.5%	14.8%	23.9%	15.0%	33.7%
[...]-[...]-Agr	6.5%	11.9%	26.6%	28.1%	0%	0%	36.5%	35.5%
Total	100%	100%	100%	100%	100%	100%	100%	100%

On the other hand, if the morpheme-based approach is used, adjectives are divided into simple adjectives (e.g., *black*), deverbal adjectives (e.g., *lovable*), denominative adjectives (e.g., *childish*) and prepositional adjectives (e.g., *upper*), while compounds are divided into proper compounds (e.g., *red-haired*) and prefixed adjectives (e.g., *un-fair*):

	Classical Latin		Homeric Greek		Hittite		RV Sanskrit	
	Token	Type	Token	Type	Token	Type	Token	Type
[adjective]-Agr	79.7%	62.8%	48.8%	32.3%	65.9%	48.5%	9.9%	5.5%
[verb-NM]-Agr	7.3%	12.8%	12.5%	19.0%	25.5%	42.0%	40.1%	32.5%
[noun-ADJ]-Agr	6.1%	11.9%	10.3%	11.8%	0.8%	5.3%	13.0%	12.4%
[preposition]-Agr	0.5%	0.4%	0.3%	0.3%	7.8%	3.8%	1.5%	1.6%
PRE-[...]N-Agr	6.5%	11.9%	11.5%	14.1%	0%	0%	14.3%	17.7%
[...]N-[...]N-Agr	0%	0%	16.6%	22.1%	0%	0%	21.2%	30.3%
Total	100%	100%	100%	100%	100%	100%	100%	100%

A discussion on the differences between the two parsing methods and their consequences on the reconstruction of the PIE quality modifier construction will close the talk.

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