



Maja Bratanić, Ana Ostroški Anić, Maja Lončar



Institute of Croatian Language and Linguistics

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Struna – an instrument of Croatian terminology planning

- Radoslav Katičić: “in southeastern Europe, typically yet paradoxically, an unusual phenomenon occurs: *new languages* have a rich history”
 - the process typical of young nation states “feeling obliged to underline their cultural as well as their political distinctiveness” (Wright 2004 : 49)
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Lack of language policy

- twenty years after Croatia's political and language independence
 - coinciding with Croatian becoming the 24th official EU language
 - an articulated language policy still to a great extent missing
 - language planning left terminology planning very much aside
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Historical background

- lack of continuity in terminology
standardization greatly the result of the long history of linguistic oppression
 - Bogoslav Šulek (1816-1895) - major figure in the creation of Croatian scientific terminology
 - guiding principle: “avoid extremes, especially excessive purism and unnecessary classicism”
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Lack of terminology policy

- terminological activities took place in a rather isolated and fragmented manner
 - terminology creation and harmonization required for translating the EU legislation confined to the translation services of a few ministries, not always coordinated
 - this demanding translation task did not result in organized terminological work
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Initiation of Struna

- 2007 – the first step in Croatian terminology planning
 - Croatian Standard Language Council initiated the project Development of Croatian Special Field Terminology (STRUNA)
 - financed by the Croatian Science Foundation
 - carried out at the Institute of Croatian Language and Linguistics as the national coordinator
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Aims of Struna

- create necessary prerequisites for the creation and standardization of Croatian terminology across various domains
 - via coordination of domain experts
 - and terminologists and language experts
 - establish a framework for a national terminology policy
 - lay the foundations for more structured education in this field
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Struna termbase

- currently 20 domains and around 42 000 Croatian terms
 - 30 000 recommended terms + synonyms with equivalents in English and several other languages (87 000 altogether)
 - electronic database developed for the purpose
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[Anatomy and Physiology](#)

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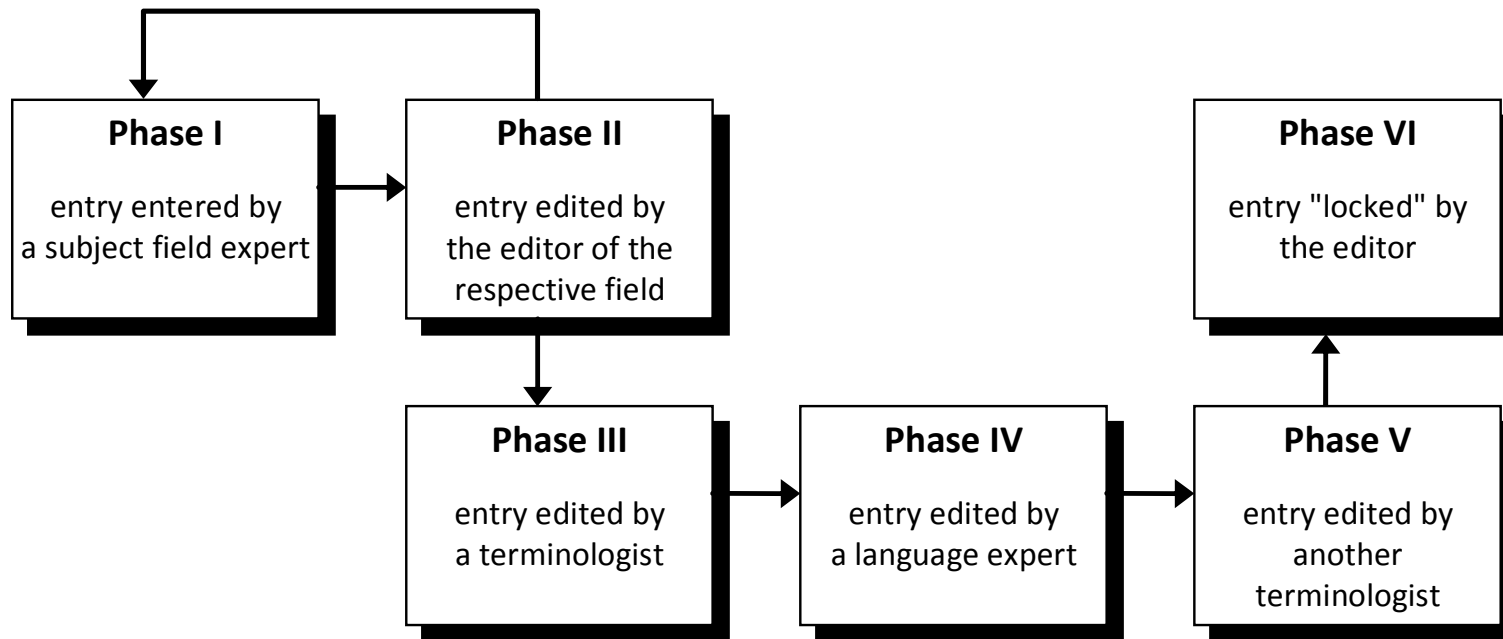


Underlying methodology

- normative termbase
 - largely organized according to the principles of the GTT and relevant ISO/TC 37 terminological standards
 - TBX compatible
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A unique model of terminology work

- collaborative terminology work between subject field experts and terminology and language experts
 - shared responsibility
 - IHJJ: terminologists and Croatian language consultants
 - workflow divided into six phases
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Native terms vs. internationalisms

- dilemmas in the process of standardization arise from the principle of giving preference to native-language elements in keeping with long-established Croatian normativist practice
 - disagreements between the domain experts and language experts in charge of the preferred usage
 - mostly when the terminology of a particular domain has its own traditions
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Advantages and drawbacks

- the model:
 - guarantees close collaboration of the two areas of expertise
 - imposes too great a responsibility of special field experts in terminographic management
 - requires high degree of familiarity of the terminologist with the domain in question
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Users

- another disadvantage of such a relative independence of the domain experts:
 - different projects may address different categories of users
 - for the model to achieve its full potential:
higher degree of coordination among the two expert groups and a more rigid adherence to the workflow required
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Data categories-1

- 46 categories
 - administrative data categories recorded automatically
 - **concept level:** subject field and subfield, definition, subordinate concept, sources, interdisciplinary term label, note, formula, equation, symbol, picture, shared resources
 - **term level:** preferred term, synonyms, context, neologism label, equivalents, abbreviations
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Data categories-2

- **language level:** grammatical information, foreign term label
 - **mandatory categories:**
 - preferred term
 - grammatical information
 - definition
 - equivalent in English
 - **synonyms:** admitted, deprecated, obsolete, colloquial and proposed
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Definition

- terminology must reflect the conceptual structure of a certain domain
 - degree of variation in definition structure
 - different types of definitions in e.g. biomedical domain, engineering, anthropology or EU law
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Contextual information-1

- context traditionally used as a source of linguistic information
 - defining context (ISO 704)
 - context as a source of domain knowledge information on the concept
 - knowledge-rich contexts
 - context and note used as a source of relevant linguistic and extralinguistic information
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Contextual information-2

- in Struna context always taken from a source
 - note usually written by the field specialist or terminologist
 - contextual information (context and note)
 - concept level (conceptual relations among concepts in the framework or entire domain; multidimensionality of a concept)
 - term level (usage information)
 - encyclopedic information
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Sources of conceptual relations

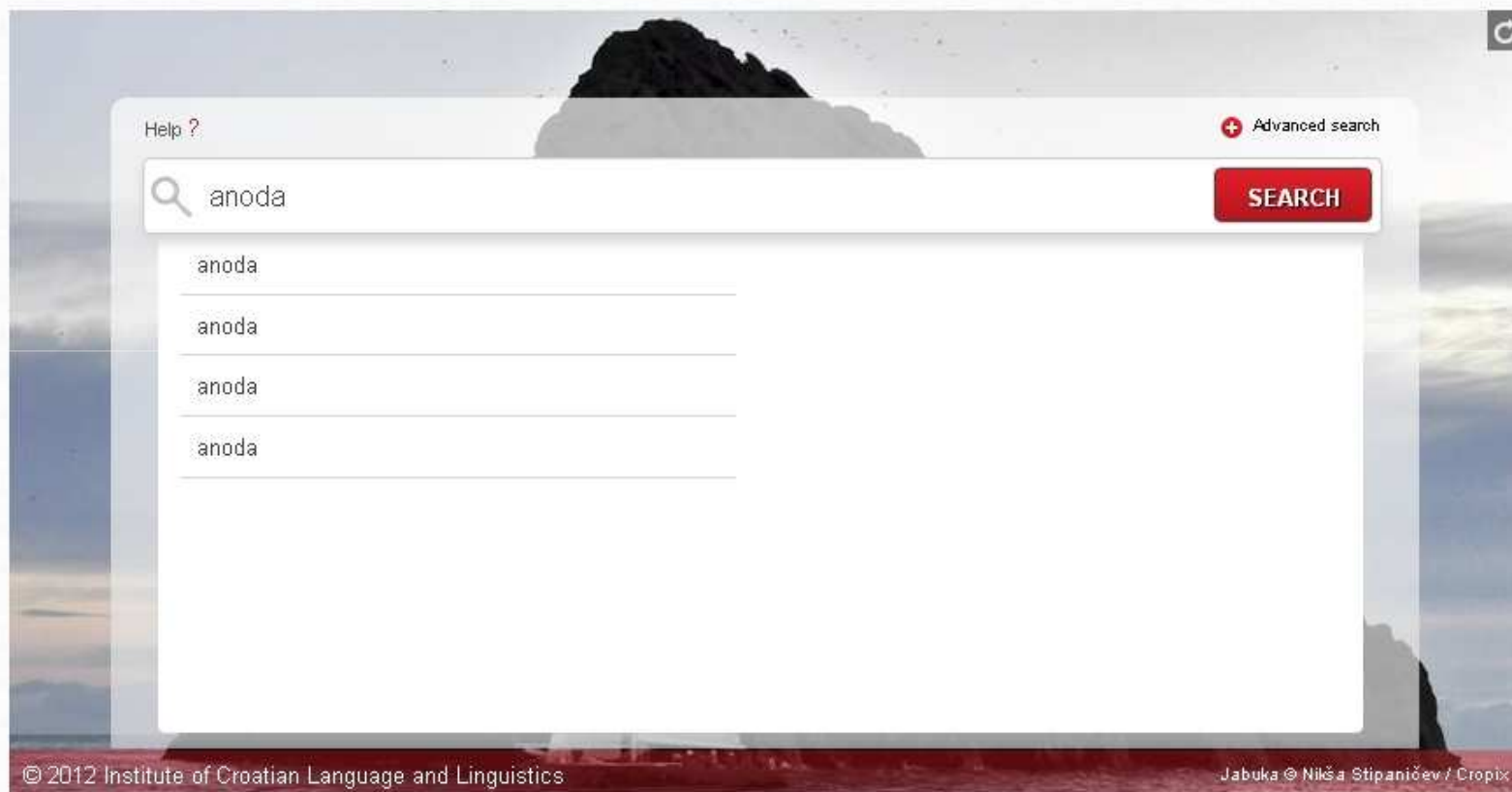
- Broca's area – (*definition*) the part of left frontal lobe concerned with the production of speech
 - *context* – Pierre Paul Broca (1824 – 1880), neurologist, claimed in 1861 that an aphasia in a certain patient (whose brain he examined post mortem) had been the result of an accurately circumscribed lesion of the posterior third of the second and third frontal convolutions (Head 1926: 25). This specific area was later named Broca's area.
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- Broca's area

- *note* – Recent research deals with the broader role of this region of the brain as an interface between action and perception, the central role of which is the coordination of perception and motor functions that serve as the basis of verbal and non-verbal communication.
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Harmonization-1

- multiple records of equivalent terms with identical (or roughly identical) meanings but different definitions
 - general language concepts in LSP
 - *interdisciplinary term* label introduced to avoid multiple records of the same concept
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Help ? + Advanced search

SEARCH

- anoda
- anoda
- anoda
- anoda

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Harmonization-2

- analysis of multiple terminological entries carried out when all entries were merged into a single search engine
 - (Bergovec, M.; Runjaić, S. Harmonization of Multiple Entries in the Terminology Database Struna (Croatian Special Field Terminology). // *Proceedings of the 10th Terminology and Knowledge Engineering Conference (TKE 2012)*, 19–22 June 2012, Madrid, Spain / ur. Guadalupe Aguado de Cea et al. str. 231–241.)
 - 80 percent of multiple entries turned out to be conceptual synonyms
 - related domains (e. g. polymers, corrosion, and chemistry) defined the same concepts from a different perspective
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Help ? + Advanced search

SEARCH

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Search results for: **ANODA**

<p>anoda</p> <p>negativno nabijena elektroda → no related concept</p>	kemija
<p>anoda</p> <p>pozitivna elektroda u [elektrolitskome članku] → electrolytical cell</p>	elektrotehnika
<p>anoda</p> <p><u>elektroda</u> na kojoj prevladava [anodna reakcija] → type of reaction</p>	kemijsko inženjerstvo
<p>anoda</p> <p><u>elektroda</u> koja ima veći [električni potencijal] → electrical potential</p>	fizika

Harmonization-3

- concept analysis done before the terminological work in the termbase
 - harmonization should begin at concept level and continue at term level
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Case study

- EU law in Struna:
“Croatian terms for concepts of EU law”



Law, language & reality

- “if the legislator, in a new law, describes a legal phenomenon otherwise than in an earlier law, then the legal reality changes: **law only exists in human language**”
(Brækhus, 1956)
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Legal concepts & objects

- specific relationship among the legal concepts and objects:
 - “inversion”: we first construct concepts, and then objects may be generated
 - some ideas remain on the concept level, and are never “objectivised”: for some legal concepts objects do not exist at all
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Legal concepts

- Heribert Picht (2012), Legal concepts – a transdisciplinary mirror of society:
 - most legal concepts are constructions, not abstractions
 - legal concepts are open for interpretation in legal practice and theory
 - concepts change by negotiation and agreement, not by scientific cognition
 - the life cycle of a legal concept is determined by societal changes, not necessarily by scientific cognition and research
 - the need for constant maintenance is needed
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Concept change

- sometimes we know in advance that the definition of a certain concept will change
 - example: *qualified majority*
 - until 31 October 2014: at least 255 votes in favour representing a majority of the members
 - from 1 November 2014: at least 72% of the members of the Council, representing Member States comprising at least 65% of the population of the Union
 - between 1 November 2014 and 31 March 2017: a member of the Council may request that it be adopted in accordance with the qualified majority as defined before 1 November 2014
 - need for specific definition data categories: “obsolete” definition, “future” definition
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Different terms: same concepts or different concepts?

- with the change in terms, the corresponding concepts change, leading to confusion:
 - *common market, single market, internal market*



Definition

- definition is a mandatory data category in Struna
 - definitions are rather descriptions than typical terminological definitions
 - sometimes it was very difficult to define basic concepts that are self explanatory (*free movement of persons, free movement of goods, free movement of capital, freedom to provide services*)
 - it would be easier to replace it with context
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Legal vs. EU terminology

- problems typical of legal terminology: how to find equivalents (terms in foreign languages) for concepts that do not exist in the concept system of other language
 - EU law is a multilingual legal system
 - EU system is not based on co-drafting:
most of the official documents in the EU are drafted in English, and then translated into all other official languages
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Secondary term formation

- “principle of equal authenticity for all official language versions of legal documents: multilingual primary term formation has become an issue” (Temmerman)
 - an acceding country cannot formally participate in the primary term formation
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Same terms: different concepts

- one in the national law and one in the EU
- formalise this situation (maybe with a special label)



Same concepts: different terms

- a term in the Croatian translation of the directive was different from the Croatian national act in which that directive was implemented
 - a term from the working version of the translation is better than the one in the official version of the document (*general government: opća država or ukupna država*)
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Stipulative definitions

- Council Directive 2009/133/EC:
“division’ means an operation whereby a company (...) transfers all its assets and liabilities to two or more existing or new companies...”
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- abbreviated form of the preferred term was needed so we introduced it as a new data category in Struna
 - appellations (names) for individual concepts processed into the term base
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Conclusion

- processing EU law terminology within the national term base has been very challenging
 - some requirements of the database were difficult to fulfil
 - some specific needs influenced the structure of the term base
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