Unified Modeling of Length in Language

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Preface

The aim of this volume is to find a unified model of length distribution of any unit in language. It is merely a trial leaning against published results. It is impossible to perform the analysis for “all possible” units because only some of them are known and used, the definition of new ones is the normal policy in science. And even if a new unit is defined, it takes a special place in the hierarchy of other units which must be defined, too. Hence, this enterprise is endless.

We used published data from ca 50 languages, their dialects and historical epochs. It was impossible to use everything that has ever been published, it is already a separate discipline within linguistics. The majority of data has been elaborated in several projects performed in Göttingen where also students took part in the work (cf. http://www.gwdg.de/~kbest/projekt.htm). Besides three volumes quoted in the references (cf. Best 1997, 2001; Grzybek 2006) there are a number of publications in different journals.

Our main aim was to find a law of length and its special forms at individual language levels, that is, to avoid the search for ever new models whose validity is always merely local: they hold for the given level in the given language and taken together form an enormous family of distributions. In the unified model there are merely differences in the parameters, and the parameters themselves are part of a dynamic system displaying self-regulation.

We hope that researchers will test it in further languages and on different linguistic levels.

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Learn about the most important Unified Modeling Language diagrams used in the visual modeling of computing programs. As I mentioned, UML was meant to be a unifying language enabling IT professionals to model computer applications. The primary authors were Jim Rumbaugh, Ivar Jacobson, and Grady Booch, who originally had their own competing methods (OMT, OOSE, and Booch). Eventually, they joined forces and brought about an open standard. (Sound familiar? A similar phenomenon spawned J2EE, SOAP, and Linux.) One reason UML has become a standard modeling language is that it is programming-language independent. (UML modeling tools from IBM Rational are used extensively in J2EE shops as well in .NET shops.)

Unified Modeling language (UML) is a standardized modeling language enabling developers to specify, visualize, construct and document artifacts of a software system. Thus, UML makes these artifacts scalable, secure and robust in execution. UML is an important aspect involved in object-oriented software development. It uses graphic notation to create visual models of software systems. Advertisement. Techopedia Explains Unified Modeling Language (UML). The UML architecture is based on the meta object facility, which defines the foundation for creating modeling language. They are precise enough to generate the entire application.

1.6.2 Improving Unified Modeling Language by Using Topology. The UML improvement by using mathematical topology is based on topology and formalism of Topological Functioning Model (TFM) [86]. The TFM is a mathematical modeling language intended to design and analyze functionality of a system and it holistically represents a complete functionality of the system from a computation independent viewpoint. It considers problem domain information separate from the solution domain information. TFM has strong mathematical basis and is represented in a form of a topological space. Unified Modeling Language (UML) is a standardized visual specification language for object modeling in the field of software engineering.

Unified Modeling Language is a general-purpose modeling language that includes a graphical notation used to create an abstract model of a system, referred to as a UML model. It consists of: Structure diagrams: emphasize what things must be in the system being modeled. Behavior diagrams: emphasize what must happen in the system being modeled. This paper presents the uses of Unified Modeling language (UML) for describing cadastral information systems in terms of functional, static and dynamic models. These models enhance the transparency of the national cadastral organization by visualizing its business in the forms of UML diagrams and notations. With describing the key concepts for modeling the organization’s enterprise architecture using the Unified Modeling Language (UML).

Enterprise architecture consists on defining and understanding the different elements that shape the organization and how these elements are interrelated with the purpose of understand and facilitate organizational evolution and change.