

## **Preparation vADL.net: A Software Architecture Tool with Support to All of Architectural Concepts Title**

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**Abstract :** Software architecture is a method of describing the architecture of a software system at a high level of abstraction. It represents a common abstraction of a system that stakeholders can use as a basis for mutual understanding, negotiation, consensus, and communication. It also manifests the earliest design decisions about a system, and these early bindings carry weight far out of proportion to their individual gravity with respect to the system's remaining development, its deployment, and its maintenance life, therefore it is the earliest point at which design decisions governing the system to be built can be analyzed. In this paper, we present a tool to model the architecture of software systems. It represents the first method by which system defects can be detected, and provide a clear representation of a system's components and interactions at a high level of abstraction. It can be distinguished from other tools by its support to all software architecture elements. The tool is built using VB.net 2010. We used this tool to describe two well know systems, i.e. Capitalize and Client/Server, and the descriptions we obtained support all architectural elements of the two systems.

**Keywords :** software architecture, architecture description languages, modeling

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