Browser Infrastrcture Pattern

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ABSTRACT

Currently a lot of software developments create systems that are connected to the Internet, which allows to add functionality within a system and facilities to their *Stakeholders*. This leads to depend in a *web client*, as the *Web Browser*, which allows access to services, data or operations that the system delivers. Nevertheless, the Internet influences the attack surface of the new system, and unfortunately many stakeholders and developers are not aware of the risks they are exposed. The lack of Security Education in Software developers of a project, the low and scattered documentation of each browser (and standardization), could become a great flaw in big architectural developments which depends on the browser to do their services. A Reference Architecture of the *Web Browser*, using Architectural Patterns, could be a base for understanding the security mechanisms and its architecture, which interacts with a bigger web system. This would give an unification of ideas and terminology, giving a holistic view regardless the implementation details for both the browser and the system it communicates to. We developed a Browser Infrastrcture Pattern which describes the infrastructure to allow the communication between a Web Client and Server in the Internet. With this work we propose an Architectural Pattern as the first piece of our Reference Architecture for the Web Browser.

Keywords

Web Browser, Web Client, Modular Architecture, Browser Architecture, Reference Architecture, Browser Infrastructure pattern

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